

# Commercial FERTILIZERS

# Report for 1960

**H. J. FISHER**  
**Chief Chemist**

Bulletin 637

January 1961



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# REPORT ON INSPECTION AND ANALYSIS OF COMMERCIAL FERTILIZERS

1960

H. J. FISHER, Chief Chemist<sup>1</sup>

## CONNECTICUT LAW AND REGULATIONS REGARDING COMMERCIAL FERTILIZERS

The term "commercial fertilizers", as used in the Connecticut fertilizer statute, includes "any and every substance imported, manufactured, prepared or sold for fertilizing or manuring or soil amendment purposes, except barnyard manure and stable manure which have not been artificially treated or manipulated, marl and lime." An amendment of the law in 1949 permitted fertilizers to be labelled with guaranties of elements other than nitrogen, phosphorus and potassium, but did not change the requirement that mixed fertilizers must contain at least 0.82 per cent of nitrogen, and 1 per cent of either phosphoric acid or potash, for guaranties of these elements to be made. Phosphorus must be declared as available phosphoric acid (except in the case of bone, tankage and other natural organic materials, where total phosphoric acid is guaranteed), and potassium as water-soluble potash; all other elements must be guaranteed in terms of percentages of the elements, not as oxides or salts. A registration fee of \$10.00, payable annually, is charged for each element guaranteed in each brand of fertilizer; there is also a six-cent tonnage tax, payable semiannually.

While manufacturers usually register their own fertilizers, if a retailer sells a fertilizer manufactured by an out-of-state firm, and that firm refuses to register, under the law the retailer is responsible for registration fees and tonnage taxes. The retailer, therefore, should assure himself that the requirements of the law have been met by the manufacturers of the brands which he handles, or himself be prepared to meet all these requirements.

The law exempts from registration, and from other requirements, only: (1) fertilizers passing through the State in transit; (2) fertilizers and fertilizer materials shipped to regular fertilizer factories to be used for manufacturing purposes; and (3) fertilizers and fertilizer chemicals sold to The Connecticut Agricultural Experiment Station for experimental purposes.

Cottonseed, linseed, peanut and soybean  
oil meals, when sold or used for fertilizer  
purposes, must be registered as fertilizers

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<sup>1</sup> Analyses were made by Messrs. Richard A. Botsford, Sherman Squires, Werner Mueller and Walter Oliver and Miss Helen Kocaba; inspection and sampling by Mr. R. Richard Nichols; compilations by Miss Eleanor Hopcraft.

and the specified fees paid thereon. For such products the registration fee is \$10.00 per brand. This fee and the tonnage tax are entirely apart from the registration fee required by the feeding stuffs law for vegetable meals used as feeds (there is no tonnage tax on feeds).

Because manufacturers or jobbers do not know how much, if any, of their vegetable meal tonnage is sold or used as fertilizers, local dealers and purchasers report their sales or purchases to this Station. This information is not for publication but is used to inform manufacturers of the total sales of their meal as fertilizer in this State. It is expected that the fees provided for by statute will be paid by the manufacturer or other party responsible for the brands.

#### OFFICIAL DEFINITIONS OF FERTILIZER TERMS AND MATERIALS

It is expected that fertilizers sold in this state will comply with the regulations and standards of the Association of American Fertilizer Control Officials. A copy of the "Official Publication" of that Association giving these definitions and regulations may be obtained from the secretary-treasurer, B. D. Cloaninger, Drawer 392, Clemson, South Carolina, for \$2.00.

#### REGISTRATIONS

For 1960, 105 firms and individuals registered 464 brands of fertilizer at this Station for sale in the State. As required by statute, the brands are listed as follows:

AGRICULTURAL PRODUCTS CO., 589 Atwells Ave., Providence,  
R. I.

Guardian 8-6-4 Gro Green Lawn Fertilizer  
Lawn & Garden 5-10-5  
Super Turf King 8-6-4 Lawn Food  
Turf King Lawn & Garden Fertilizer 6-10-4

AGRICULTURAL SUPPLY CO., 221 Richmond Ave., West Haven,  
Conn.

Yale Special Mixture

ALLIED CHEMICAL CORP., Nitrogen Div., P. O. Drawer 61,  
Hopewell, Va.

"Arcadian" A-N-L Fertilizer Compound  
"Arcadian" 12-12-12 Granular Fertilizer  
"Arcadian" Nitrana Solution 2  
"Arcadian" Nitrana Solution 3  
"Arcadian" Nitrana Solution 4  
"Arcadian" Nitrate of Soda  
"Arcadian" Pelleted Ammonium Nitrate



ALLIED CHEMICAL CORP., Nitrogen Div., P. O. Drawer 61,  
Hopewell, Va. - Cont.

"Arcadian" Uran 30 Solution

"Arcadian" Uran 32 Solution

"Arcadian" Urea 45 Fertilizer Compound (Pelleted)

AMERICAN AGRICULTURAL CHEMICAL CO., 285 River St., No.  
Weymouth, Mass.

AA Fertilizer 0-15-30

AA Fertilizer 0-20-20

AA Fertilizer 5-10-10 with 1.2 Magnesium

AA Fertilizer 8-16-16

AA Fertilizer 10-6-4

AA Fertilizer 10-10-10

AA Fertilizer 15-10-10

AA Plant Food 5-10-5

Agrico African Violet Plant Food 17-17-17

Agrico Country Club 6-10-4

Agrico Country Club 8-6-4

Agrico Country Club 10-6-4

Agrico for Azaleas, Camellias & Rhododendrons 6-10-4

Agrico for Corn 8-16-16

Agrico for Gardens 5-10-5

Agrico for Lawns, Trees & Shrubs 6-10-4

Agrico for New England 5-8-7

Agrico for Potatoes 5-10-10 with 1.2 Magnesium

Agrico for Seeding Down 5-20-10

Agrico for Top Dressing 7-7-7

Agrico for Top Dressing 12-12-12

Agrico for Top Dressing 15-10-10

Agrico for Turf 6-8-2

Agrico for Turf 10-6-4

Agrico House Plant Food 17-17-17

Agrico Pesticide & Turf Food 6-10-4

Agrico Phosphate & Potash 0-15-30

Agrico Phosphate & Potash 0-20-20

Agrico Rose Food 5-9-6

Agrico Water Soluble Plant Food 17-17-17

Agrinite

Agri-Phos 20% Superphosphate

Bone Meal

Ground Phosphate Rock

Muriate of Potash

Pulverized Sheep Manure

Sulphate of Ammonia

Superphosphate, 18% Normal

AMERICAN CYANAMID CO., P. O. Box 383, Princeton, N. J.

AERO Cyanamid, Granular

AERO Cyanamid, Special Grade

AERO-PHOS Florida Natural Phosphate 31%

AERO-PHOS Florida Natural Phosphate 33%

AEROPRILLS Ammonium Nitrate Fertilizer

AERO Urea

AMERICAN CYANAMID CO., P. O. Box 383, Princeton, N. J. - Cont.

Amanol Solutions  
Lawn and Garden Cyanamid  
Trebo-Phos Triple Superphosphate

ARCHER-DANIELS-MIDLAND CO., 700 Investors Bldg.,  
Minneapolis, Minn.

Archer Quality 44% Protein Solvent Extracted Soybean Oil  
Meal

ARMOUR AGRICULTURAL CHEMICAL CO., Box J, Carteret, N. J.

Armour Armorganic Plant Food  
Armour Big Crop Fertilizer 0-20-20  
Armour Big Crop Fertilizer 5-8-7  
Armour Big Crop Fertilizer 5-10-5  
Armour Big Crop Fertilizer 5-10-10  
Armour Big Crop Fertilizer 7-7-7  
Armour Big Crop Fertilizer 10-10-10  
Armour Big Crop Superphosphate  
Armour Bone Meal Fertilizer  
Armour Cattle Manure  
Armour Gold Bond Tobacco Grower  
Armour Home & Garden Special  
Armour Lawn Special  
Armour Pulverized Sheep Manure & Inert Matter  
Armour Vertagreen for Acid Loving Plants 5-10-10  
Armour Vertagreen Complete Plant Food for Commercial  
Crops 3-12-12  
Armour Vertagreen Plant Food 5-10-5  
Armour Vertagreen Plant Food for Commercial Crops  
6-12-12  
Armour Vertagreen Plant Food for Commercial Crops  
Tobacco Special 6-4-7  
Armour Vertagreen Plant Food for Turf & Trees 10-6-4  
Armour Vertagreen Turf Food with Chlordane 10-6-4  
Armour Vertagreen Turf Maker 8-6-2 (50% Organic)

ASGROW SEED CO., 272 George St., New Haven, Conn.

Gro-Sod Lawn Food  
Purge  
Weed-Nix Lawn Food

ATKINS & DURBROW, INC., Box 55, Port Colborne, Ontario, Canada

Driconure 3-2-1  
Driconure 3-2-2

ATLANTIC PROCESSING CO., Promised Land St., Amagansett,  
N. Y.

Smith's Life Line Fish Meal

F. A. BARTLETT TREE EXPERT CO., 2770 Summer St., Stamford,  
Conn.

Bartlett Green Tree Food

BENNETT & CLAYTON Div. Unexcelled Chemical Corp., Prospect Plains, Cranbury, N. J.

B/C Brand Fertilizer 5-10-5

B/C Brand Fertilizer 5-10-10

Garden Crest 5-10-5

Garden Crest 10-6-4 25% Hi Org.

General Green 20-10-5

Lawn & Garden 10-6-4 (B. C. Brand)

Lawn & Garden 10-6-4 100% (B. C. Brand)

Lawn Life 20-10-5

Lawn Master 5-10-5

Lawn Master 10-6-4 Hi Organic

BLACKSTONE GUANO CO., INC., 2000 Chesapeake Ave., Baltimore, Md.

Blackstone Fairlawn 25% Organic

Blackstone Ranch Home

BONNIE GREEN PRODUCTS CO., Front & Bainbridge Sts., Philadelphia, Pa.

Bonnie Green Complete Lawn & Garden Food 16-8-9

THE BORDEN CO., Chemical Div., 350 Madison Ave., New York, N. Y.

Borden's "38"

JOSEPH BRECK & SONS, 401 Summer St., Boston, Mass.

Breck's Feed No Weed with 2, 4-D plus 2, 4, 5-T

Breck's Garden-Gro

Breck's Greenite (all organic)

Breck's New Improved Turf-Gro

Breck's Quick-Life

Breck's Turf-Gro

THE BRODE CORP., Box 700, Memphis, Tenn.

Owl Brand 41% Prime Cottonseed Meal

BROOKSIDE NURSERIES, INC., 228 Brookside Rd., Darien, Conn.

Brookside's Dried Blood

Brookside's Natures Nutrients

Brookside's Raw Bone Meal

THE BUCKEYE CELLULOSE CORP., Cincinnati, Ohio

Buckeye 41% Protein Cottonseed Meal for Fertilizer

W. ATLEE BURPEE CO., 18th & Hunting Park, Philadelphia, Pa.

Burpee Lawn Food 20-10-5

CADWELL & JONES, INC., 199 Walnut St., Hartford, Conn.

C & J Hi-Organic Fertilizer 10-6-4

C & J Lawn Food with Weed Killer

C & J Plant Food 5-10-5

CALIFORNIA SPRAY-CHEMICAL CORP., Lucas & Ortho Way,  
Richmond, Calif.

ORTHO-GRO Liquid Plant Food 15-5-5

ORTHO Lawn Groom 7-11-5

ORTHO Liquid Rose Food 8-12-4

CARBOLA CHEMICAL CO., Natural Bridge, N. Y.

CCC Triple 20 Plant Food

THE PETER CASCIO NURSERY, 2600 Albany Ave., W. Hartford,  
Conn.

Peter Cascio Nursery Raw Ground Bone

CHILEAN NITRATE SALES CORP., 120 Broadway, New York, N. Y.

Chilean Nitrate of Soda - Champion Brand

Chilean Nitrate of Soda-Potash - Champion Brand

COLORO-SPRAY CORP., 2215 N. American St., Philadelphia, Pa.

Cloro-Spray

Fairway-Spray 15-10-5

COCKE & CO., 208 William Oliver Bldg., Atlanta 3, Ga.

Cocke-Sure Brand Prime Quality 41% Protein Cottonseed  
Meal

COMMERCIAL SOLVENTS CORP., 260 Madison Ave., New York,  
N. Y.

CSC Hi-D Ammonium Nitrate Fertilizer

CONSOLIDATED RENDERING CO., 178 Atlantic Ave., Boston, Mass.

Corenco 0-15-30

Corenco 0-20-20

Corenco 0-20-20 with .11 Boron

Corenco 5-5-15 Tobacco Starter

Corenco 5-8-7

Corenco 5-10-5

Corenco 5-10-5 Home Garden

Corenco 5-10-5 Rose Special

Corenco 5-10-10

Corenco 5-10-10 with 1.2 Magnesium

Corenco 5-10-10 Liquid Fertilizer Concentrate

Corenco 6-3-6 Perfection

Corenco 6-3-6 Premium

Corenco 6-8-8 with 1.2 Magnesium

Corenco 7-7-7

Corenco 7-7-7 Rhododendron

Corenco 8-6-4 Landscape

Corenco 8-6-4 Turf Green

Corenco 8-6-4 Turf Green with Chlordane

Corenco 8-12-12 with .9 Magnesium

Corenco 8-16-16

Corenco 10-5-5 Liquid Green

Corenco 10-6-4 Golf & Lawn

Corenco 10-6-4 Granular Form Fertilizer



## CONSOLIDATED RENDERING CO., Boston, Mass. - Cont.

Corenco 10-8-2 Timberline  
Corenco 10-10-10  
Corenco Cottonseed Meal  
Corenco Fish Meal  
Corenco Ground Bone  
Corenco Organic Turf Fertilizer  
Corenco Sheep Manure with Inert Matter  
Corenco Spurz-on  
Corenco Superphosphate 20%  
Muriate of Potash  
Sulphate of Potash

## THE DAVEY TREE EXPERT CO., 117 S. Water St., Kent, Ohio

Davey Shredded Cattle Manure  
Davey Tree Food

## R. G. DAVIS CO., 560 Grand Ave., New Haven, Conn.

Organo

## DAVISON CHEMICAL CO., Div. W. R. Grace &amp; Co., Hill Plant, Baltimore, Md.

0-15-30 Davco Granulated Fertilizer  
0-15-30 Davco Granulated Fertilizer with Boron  
0-20-20 Davco Granulated Fertilizer  
5-10-5 Davco Granulated 3G Fertilizer  
5-10-5 Davco Turf and Garden Food  
5-10-10 Davco Granulated 3G Fertilizer  
5-10-10 Davco Nutri-Gran Potato (Prem) with 1.2 Magnesium  
7-7-7 Davco Granulated Fertilizer  
8-16-16 Davco Granulated 3G Fertilizer  
10-10-10 Davco Granulated 3G Fertilizer  
10-20-10 Davco Granulated 3G Fertilizer  
10-20-20 Davco Granulated 3G Fertilizer  
15-10-10 Davco Granulated 3G Fertilizer  
Davco Granulated 20% Superphosphate

## DAYTON FERTILIZER CORP., Georges Rd., Dayton, N. J.

Daytonite Plant Food 10-6-4  
Grand Garden Plant Food 6-10-4  
Grand Garden Rose Food 6-8-6  
Lawn Treat Lawn & Garden Fertilizer 5-10-5  
Lawn Treat Lawn & Garden Fertilizer 10-6-4

## DOUGHTEN SEED CO., 253 Brunswick St., Jersey City, N. J.

Doughten's Lawn Food 9-8-3

## E. I. duPONT deNEMOURS &amp; Co., 6054 duPont Bldg., Wilmington, Del.

DU PONT NU GREEN Fertilizer Compound  
DU PONT Soluble Plant Food 19-22-16  
DU PONT URAMITE Fertilizer Compound  
DU PONT URAMITE M Fertilizer Compound

EASTERN STATES FARMERS' EXCHANGE, INC., 26 Central St.,  
W. Springfield, Mass.

Castor Pomace  
Cotton Hull Ashes  
Eastern States 0-15-30 with .2 Boron  
Eastern States 0-25-25  
Eastern States 5-10-10 SM with 1.2 Magnesium  
Eastern States 8-16-16 with .6 Magnesium  
Eastern States 10-10-10 with .6 Magnesium  
Eastern States 10-10-10 LC with 1.2 Magnesium  
Eastern States 10-15-15 with 1.2 Magnesium  
Eastern States 10-15-15 LC with 1.2 Magnesium  
Eastern States 10-20-10 with .6 Magnesium  
Eastern States 15-10-10  
Eastern States Green Lawn  
Eastern States Ground Steamed Bone Meal  
Eastern States Muriate of Potash 60%  
Eastern States Start-N-Gro  
Eastern States 20% Superphosphate

EDGEWOOD FARMS, INC., Marysville, Ohio

Edgewood Farms Boost  
Edgewood Farms Rose Food

THE ESPOMA CO., P. O. Box 431, Millville, N. J.

Bulb Tone  
Espoma 3-2-1  
Espoma 10-6-4  
Espoma Garden  
Espoma Rose Food  
Holly-Tone

FAESY & BESTHOFF, INC., 25 E. 26th St., New York, N. Y.

F & B All-Purpose Pelletized 10-6-4  
F & B Cottonseed Meal  
F & B Evergreen Food 7-7-7  
F & B Pure Steamed Bone Meal

FARMERS COTTON OIL CO., Wilson, N. C.

41% Cottonseed Meal

THE GARDEN CENTER INC., 53 LaSalle Rd., W. Hartford, Conn.

Garden Center Lawn Fertilizer  
Garden Center Lawn Weed Killer & Feed Granules

GEIGY AGRICULTURAL CHEMICALS, Saw Mill River Rd.,  
Ardsley, N. Y.

Sequestrene 138 Fe Iron Chelate  
Sequestrene 330 Fe Iron Chelate  
Sequestrene  $\text{Na}_2\text{Cu}$  Copper Chelate  
Sequestrene  $\text{NaFe}$  Iron Chelate  
Sequestrene  $\text{Na}_2\text{Mn}$  Manganese Chelate  
Sequestrene  $\text{Na}_2\text{Zn}$  Zinc Chelate

GODFREY'S GARDEN SHOPPE, 1630 Post Rd., Fairfield, Conn.

(Registered by The Hubbard-Hall Chemical Co., Waterbury,  
Conn.)

Godfrey's Lawn & Tree Food

GOLDENROD OIL MEAL SALES CO., 727 Beale St., Memphis, Tenn.

Goldenrod Brand 41% Protein Cottonseed Meal

GOULARD & OLENA, INC., Skillman, N. J.

G & O Cattle Manure

G & O Evergreen Tree & Shrub Food

G & O Ground Bone

G & O Hyganic 10-6-4

G & O Light Fantastic Lawn Food 20-6-4

G & O Muriate of Potash

G & O Nitrate of Soda

G & O Prime Cottonseed Meal 41%

G & O Prizegro

G & O Rhodo-Azalea-Camellia-Holly-Blueberry

G & O Rose Food

G & O Special Food for Bulbs

G & O Sulphate of Ammonia

G & O Tomato Food

Peter Cascio's Private Label 5-10-5

Peter Cascio's Private Label 10-6-4

W. R. GRACE & CO., Grace Chemical Div., 147 Jefferson Ave.,  
Memphis, Tenn.

Grace Urea Prills

HALSTEAD DISTRIBUTING CO., Suttons Lane, Mt. Kisco, N. Y.

Just Right 5-10-5 for Lawns Gardens & Shrubs

Just Right Turf Food

THE CHARLES C. HART SEED CO., 304 Main St., Wethersfield,  
Conn.

Hart's All Organic

Hart's All Purpose Plant Food

Hart's Crabgrass Finis

Hart's Turf Food

Hart's Two-For-One

HAYNIE PRODUCTS, INC., 108 E. York St., Baltimore, Md.

Hi-Seas Menhaden Fish Meal

HERCULES POWDER CO., 900 Market St., Wilmington, Del.

Hercules-Nitroform

HERSHEY ESTATES, Hershey, Pa.

Ko-K-O Meal

CHAS. HERSHKOVITZ, INC., Station 51, So. Windsor, Conn.

Magic Gro Liquid Plant Food 15-10-5

A. H. HOFFMAN, INC., Landisville, Pa.

Hoffman Cow Manure (Dehydrated)

Hoffman Sheep Manure (Dehydrated)

HOKE OIL & FERTILIZER CO., 220 Wilmouth St., Raeford, N. C.

HOKE BRAND Prime Quality 41% Cottonseed Meal

GEO. A. HORMEL & CO., Austin, Minn.

VITA-BLACK 6-3-3 Specialty Lawn & Garden Fertilizer

THE HUBBARD-HALL CHEMICAL CO., 28 Benedict St., Waterbury, Conn.

Blood Tankage

Castor Pomace

Cotton Hull Ashes

Dry Ground Fish

Green Gro Lawn Fertilizer 6-7-4

Green Ribbon Lawn Food 10-6-4

Green Ribbon Plant Food 5-10-5

Gro-Fast Sol Water Soluble Concentrate 16-20-16

HH Bone Meal

HH Cow Manure & Inert Matter

HH Evergreen Food

HH Lawn Fertilizer with Chlordane

HH Muriate of Potash 60%

HH Nitrogran

HH Plant Food

HH Rose Food

HH Sheep Manure & Inert Matter

HH Turf & Tree Food

HH Weed-Kil Lawn Food with 2, 4-D

Horn & Hoof Meal

Liberty Fertilizer 0-15-30

Liberty Fertilizer 0-20-20

Liberty Fertilizer 0-20-20 with Boron

Liberty Fertilizer 5-8-7

Liberty Fertilizer 5-10-5

Liberty Fertilizer 5-10-10

Liberty Fertilizer 5-10-10 with 1.2 Magnesium

Liberty Fertilizer 5-15-30

Liberty Fertilizer 6-8-8 with 1.2 Magnesium

Liberty Fertilizer 7-7-7

Liberty Fertilizer 8-6-4 (50% Organic)

Liberty Fertilizer 8-12-12 with 1.2 Magnesium

Liberty Fertilizer 8-16-16

Liberty Fertilizer 10-6-4

Liberty Fertilizer 10-10-10

Liberty Fertilizer 10-10-10 with Boron

Liberty Fertilizer 15-10-10

Liberty New Super Spud with 1.2 Magnesium

Liberty Special Potato Fertilizer with 1.2 Magnesium

Liberty Super Bacco Tobacco Fertilizer with 1.2 Magnesium

Liberty Super Corn 10-10-10 Fertilizer

Liberty Super Gro 5-10-10 with 1.2 Magnesium



## THE HUBBARD-HALL CHEMICAL CO., Waterbury, Conn. - Cont.

Liberty Super Gro 6-12-12 with 1.2 Magnesium  
Liberty Super Gro 8-16-16  
Liberty Tobacco Fertilizer  
Nitrate of Potash  
Precipitated Bone  
Soybean Oil Meal  
Sulphate of Ammonia  
Sulphate of Potash  
Superphosphate, 20%  
Woodruff's Lawn & Tree Food

## HUMPHREYS-GODWIN CO., 2246 Park Ave., Memphis, Tenn.

Dixie Brand 41% Cottonseed Meal

INTERNATIONAL MINERALS & CHEMICAL CORP., P.O. Box 230,  
Woburn, Mass.

Sulphate of Potash  
(Registered by Eastern States Farmers' Exchange, Inc.,  
West Springfield, Mass.)  
Sul-Po-Mag  
(Registered by The Hubbard-Hall Chemical Co.,  
Waterbury, Conn.)  
Vi Va Lawn Food 20-6-4

## SPENCER KELLOGG &amp; SONS, INC., 120 Delaware Ave., Buffalo, N. Y.

Spencer Kellogg's 32% Protein Old Process (Expeller)  
Linseed Oil Meal  
Spencer Kellogg's 44% Protein Soybean Oil Meal - Solvent  
Extracted  
Spencer Kellogg's 50% Protein Dehulled Soybean Oil Meal -  
Solvent Extracted

## LAWN-TEX, INC., 1640 W. Fulton St., Chicago, Ill.

Organi-Green

## LEBANON CHEMICAL CORP., P.O. Box 532, Lebanon, Pa.

Lebanon Azalea Food  
Lebanon Bone Meal  
Lebanon Cow Manure  
Lebanon Fertilizer 5-10-10  
Lebanon Fertilizer 10-10-10  
Lebanon Hi-Organic  
Lebanon Plant Food  
Lebanon Rose Food  
Lebanon Sheep Manure  
Lebanon Truck Crop  
Lebanon Turf Organic  
Lebanon Uniform

## LEE PATTEN SEED CO., 360 Ninth St., Jersey City, N. J.

Patco's Combo with 2, 4-D plus 2, 4, 5-T  
Patco's Featherweight (Lawn Food)  
Patco's Lawn Food 9-8-3

L. B. LOVITT & CO., 314 Cotton Exchange Bldg., Memphis, Tenn.

"Lovit Brand" 41% Protein Cottonseed Meal Prime Quality

MAEGEO DEHYDRATING CO., Lexington, N. C.

Dehydrated Sheep Manure

Fertal-Gro (Dehydrated Cow Manure)

THE MAMLON CO., P. O. Box 3046, New Haven, Conn.

FER-LAWN Gran-U-Pell Turf Food

FER-MEL General Purpose Plant Food

FER-MEL Turf & Tree Food

McARDLE'S SEED CO., 388 Greenwich Ave., Greenwich, Conn.

McArdle's 10-6-4

McKESSON & ROBBINS, INC., Chemical Dept., 155 East 44th St.,  
New York, N. Y.

(Registered by The Hubbard-Hall Chemical Co., Waterbury,  
Conn.)

Calcium Nitrate Viking Ship Brand

MONSANTO CHEMICAL CO., 800 N. Lindbergh Blvd., St. Louis, Mo.

Lion Brand Ammonia Nitrate Fertilizer

Lion Prilled Urea Fertilizer

MONTGOMERY WARD CO., Chicago, Ill.

(Registered by Armour Agricultural Chemical Co., Carteret,  
N. J.)

Garden Mark Complete Lawn Food

Garden Mark Complete Plant Food

NATURAL PLANT FOOD CO., 1409 N. W. 50th St., Oklahoma City,  
Okla.

Longhorn Brand Cattle Manure

Ramshorn Brand Sheep Manure

NEBRASKA FERTILIZER CO., Omaha, Neb.

(Registered by Crawford Garden Supplies, E. Providence, R. I.)

Cow-O Plant Food

OLD FOX AGRICULTURAL SALES INC., 66 Valley St., E. Providence,  
R. I.

Green Lawn Fertilizer 8-6-4

Old Fox Brand 0-15-30

Old Fox Brand 4-16-20

Old Fox Brand 5-8-7

Old Fox Brand 5-10-10

Old Fox Brand 5-10-10 with 1.2 Magnesium

Old Fox Brand 6-3-6

Old Fox Brand 6-8-8 with 1.2 Magnesium

Old Fox Brand 6-10-10 with 1.2 Magnesium

Old Fox Brand 7-7-7

Old Fox Brand 8-10-10 with 1.2 Magnesium

## OLD FOX AGRICULTURAL SALES INC., E. Providence, R. I. - Cont.

Old Fox Brand 8-12-12 with 1.2 Magnesium  
Old Fox Brand 8-16-16  
Old Fox Brand 10-10-10  
Old Fox Brand 15-10-10  
Old Fox Brand Superphosphate 20%  
Old Fox Brand Tobacco Fertilizer with 1.2 Magnesium  
Old Fox Brand Triple Superphosphate 46%  
Old Fox Garden Food  
Old Fox No Pest Turf Food  
Old Fox Organo  
Old Fox Turf Food  
Old Fox Turf Food with Ureaform

PACIFIC COAST BORAX, Div. U. S. Borax & Chemical Corp.,  
50 Rockefeller Plaza, New York, N. Y.

(Registered by The Hubbard-Hall Chemical Co., Waterbury,  
Conn.)

20 Mule Team Fertilizer Borate - 46 High Grade Coarse

PAX CO., Div. Utah Cooperative Assoc., 580 W. 13th South St.,  
Salt Lake City, Utah

Pax Crabgrass and Soil Pest Control  
Pax Pride  
Pax Snap Bak (for lawns only)

## ROBERT B. PETERS CO., 323 N. 15th St., Allentown, Pa.

Peters Special 13-6-6  
Peters Special 20-5-30  
Peters Special 20-20-20  
Peters Special 25-10-10

## PITTSBURGH PLATE GLASS CO., Red Wing, Minn.

Red Wing 34% Protein Solvent Extracted Linseed Oil Meal

## PLANT PRODUCTS CORP., Kennedy Ave., Blue Point, L. I., N. Y.

Plant Prod Sequestered Soluble Fertilizer 15-30-15

## FRANK S. PLATT CO., Post Rd., Branford, Conn.

Platt's Hi-Organic Lawn Fertilizer 10-5-5  
Platt's Lawn Weed Killer & Feed Granules

## RA-PID-GRO CORPORATION, 88 Ossian St., Dansville, N. Y.

Ra-Pid-Gro

RUHM PHOSPHATE & CHEMICAL CO., 813 So. Garden St.,  
Columbia, Tenn.

Red Seal Brand Ruhm's Phosphate Rock

## O. M. SCOTT &amp; SONS CO., Marysville, Ohio

Scott's New Turf Builder  
Scott's New Weed & Feed - Bonus



SEABOARD SEED CO., 701 S. Front St., Philadelphia, Pa.

Seaboard's Complete Lawn & Plant Food  
Seaboard's Hi-Acid Plant Food  
Seaboard's Lawn Feeding Weed Killer

SEA-BORN Mineral Div. of Skod Co., 15 E. Elm St., Greenwich, Conn.

SEA-BORN (Norwegian Seaweed Meal)

SEARS, ROEBUCK & CO., 925 So. Homan Ave., Chicago, Ill.

Cross Country Azalea-Camellia Food  
Cross Country Bone Meal  
Cross Country Bulb Food  
Cross Country Cattle Manure  
Cross Country Evergreen Food  
Cross Country Instant Plant Food  
Cross Country Instant Rose Food  
Cross Country Instant Tomato Food  
Cross Country Lawn Food  
Cross Country Lawn Food with Crabgrass Killer  
Cross Country Lawn Food with Weed Killer  
Cross Country Lawn Quick Green  
Cross Country Liquid Plant Food  
Cross Country Merion Bluegrass Lawn Food 20-5-5  
Cross Country Merion Bluegrass Lawn Food 20-10-5  
Cross Country Plant Food  
Cross Country Rose Food  
Cross Country Sheep Manure  
Cross Country Sulfate of Ammonia

SEWERAGE COMMISSION of the CITY of MILWAUKEE, P.O. Box 2079, Milwaukee, Wis.

Milorganite  
Milorganite plus 2, 4-D

THE SHERWIN-WILLIAMS CO., 101 Prospect Ave., N. W., Cleveland, Ohio

Sherwin-Williams 34% Linseed Oil Meal (Solvent Extracted)

M. L. SHOEMAKER, Div. Wilson & Co., Delaware Ave. & Venango St., Philadelphia, Pa.

M. L. Shoemaker's "Swift-Sure"

SOHIO CHEMICAL CO., Ft. Amanda & Adgate Rds., Lima, Ohio

Sohigro Urea Fertilizer Compound (coated)

THE SOUTHERN COTTON OIL CO., Div. Wesson Oil & Snowdrift Co., Inc., 738 W. Union St., Greenville, Miss.

Sco-Co 41% Protein Cottonseed Meal Prime Quality

ST. LOUIS NATIONAL STOCKYARDS CO., Exchange Bldg., National Stock Yards, Ill.

Wizard Brand Cow Manure  
Wizard Brand Sheep Manure



STERLING FOREST PEAT CO., INC., 25 Broad St., New York, N. Y.

Sterling Forest Soil

STIM-U-PLANT LABORATORIES, INC., 2077 Parkwood Ave.,  
Columbus, Ohio

Stim-U-Plant 5-8-7

Stim-U-Plant 11-12-15

SWIFT & CO., Agricultural Chemical Div., Curtis Bay, Baltimore, Md.

Golden Vigoro

Golden Vigoro with End-O-Pest

Instant Vigoro

Par-Ex

Pink Vigoro

Vigoro for Azaleas & Camellias

Vigoro Bulb Food

Vigoro Evergreen Food

Vigoro Lawn Starter

Vigoro Rose Food

Vitogro

SWISS FARMS, Philmont, N. Y.

Plantdrops Instant Liquid African Violet Food

Plantdrops Instant Liquid Plant Food

Plant Food

Rose Food

L. TEWELES SEED CO., 222 S. 3rd St., Milwaukee, Wis.

Nuturf COMBO

Nuturf TURF-LIFE

UNITED STATES STEEL CORP., 525 William Penn Place,  
Pittsburgh, Pa.

USS Ammonium Sulfate

UNIVERSAL CHEMICAL CO. INC., Box 195, West Lynn, Mass.

Electra Plant Food

VALLEY FEED & SUPPLY CO. INC., Union Rd., Spring Valley, N. Y.

Adorna

Adorna Azalea Food

Adorna Tree Food

VITTNER'S GARDEN CENTER, 1 Tolland Tnpke., Manchester, Conn.

Vittner's Lawn Weed Killer & Feed Granules

WALKER-GORDON LABORATORY CO., Plainsboro, N. J.

Bovung

OSCAR F. WARNER, 24 East Aurora St., Waterbury, Conn.

Warner Grubedizer

Warner Lawn Food

Warner Tree Food

WHITNEY SEED CO. INC., 599-601 Perry St., Buffalo, N. Y.

Vital Brand Fertilizer plus Weed Killer  
Vital Brand Lawn Fertilizer

GARFIELD WILLIAMSON, INC., 1072 Westside Ave., Jersey City, N. J.

Plantspur  
Wonderlawn Lawn Food

ANDREW WILSON, INC., Baltusrol Way, Springfield, N. J.

Wilson's Eureka Plant Food

S. D. WOODRUFF & SONS of Wethersfield, Inc., 304 Main St.,  
Wethersfield, Conn.

Woodruff's Tuf Turf Crabgrass Finis  
Woodruff's Tuf Turf Lawn Fertilizer  
Woodruff's Tuf Turf Turf Food  
Woodruff's Tuf Turf Two-For-One

## FERTILIZER INSPECTION FOR 1960

The Connecticut fertilizer law does not provide for compulsory limitation of the grades of fertilizer that may be sold in this State. However, because all authorities are agreed that a small number of grades can take care of all the needs of agriculture, and that standardization on a few grades will promote economy in the manufacture of fertilizer and aid in keeping prices down, ever since the compulsory limitation imposed by War Food Order 5 of World War II was revoked (on September 30, 1945) New England agronomists have compiled lists of recommended fertilizer ratios and minimum grades.

On October 7, 1952 the agronomists and fertilizer dealers of southern New England met at Storrs and agreed upon the following list for the 1952-1953 season:

<u>Ratio</u>	<u>Minimum Grade</u>
0-1-1	0-14-14
0-1-2	0-10-20
1-1-1	8- 8- 8
1-1-3	5- 5-15 (Tobacco fertilizer)
1-2-1	5-10- 5
1-2-2	5-10-10
2-1-2	6- 3- 6 (Tobacco fertilizer)
3-4-4	6- 8- 8
4-3-1	8- 6- 2 (For maintenance of established turf)
5-8-7	5- 8- 7

There was no change in this list until a new one was adopted at a meeting of the New England agronomists on March 1, 1960. Because the new list will not go into effect until the 1960-1961 season it will not be reproduced until our 1961 report is issued.

Prior to the 1958-1959 season more than three-fourths of the mixed fertilizers sold in this State each year were of the recommended ratios and minimum grades. Last year the percentage dropped to 69, and this year there was a further decline to 67 per cent. As was pointed out in the 1959 report <sup>1</sup>, this trend appears to be at least partially due to a proportional increase in the consumption of high-nitrogen fertilizers; for instance, 2,843 tons of the 15-10-10 grade were used during the 1959-1960 season while none of this grade was on the market during the 1957-1958 period.

There was an overall drop in fertilizer consumption from the year before of 10,574 tons. Since nearly half of this total (4,849 tons) represented a decline in vegetable meal purchases, the evidence is pretty certain that the major cause for this decline was the decrease in tobacco-growing in this State.

During the past season the Station agent collected samples of all registered brands that could be found on the market. The total number of official samples analyzed was 459.

The following tabulation lists the number of samples analyzed (both official and unofficial) of each class of fertilizer, as well as the tonnage sold during the period between July 1, 1959 and June 30, 1960 (these tonnage figures do not include fertilizer distributed under the Federal Agricultural Conservation Program):

<sup>1</sup> Conn. Agr. Expt. Sta. Bul. 628, 18 (1959)

# CLASSIFICATION OF FERTILIZER MATERIALS AND FERTILIZER TONNAGE

(Tonnage is for the period of July 1, 1959 to June 30, 1960)

	No. of Samples	Tonnage	
I. Containing chiefly nitrogen:			
Nitrate of ammonia	3	787	
Nitrate of soda	3	552	
Sulphate of ammonia	3	30	
Calcium nitrate	1	...	
Cyanamid	2	165	
Urea	3	1,209	
Castor pomace	7	548	
Cottonseed meal	47	1,535	
Dried blood	2	3	
Horn and hoof meal	2	18	
Linseed oil meal	9	209	
Soybean oil meal	7	41	
Tankage	..	38	
Other materials	10	461	
			5,596
II. Containing chiefly phosphoric acid:			
Superphosphate 18%	1	111	
20%	9	4,359	
46%	1	22	
Precipitated bone	5	202	
Phosphate rock	1	50	
			4,744
III. Containing chiefly potash:			
Muriate of potash	6	332	
Sulphate of potash	4	181	
Sulphate of potash-magnesia	1	9	
Cotton hull ashes	10	575	
			1,097
IV. Containing nitrogen and phosphoric acid:			
Dry ground fish	11	330	
Bone meal	11	422	
Other materials	2	670	
			1,422
V. Containing nitrogen and potash:			
Nitrate of potash	3	94	
Nitrate of soda-potash	1	...	
			94
VI. Mixed fertilizers:			
Commercial mixtures	244	49,901 <sup>1</sup>	
Special and home mixtures	14	6,688	
			56,589
VII. Miscellaneous:			
Aluminum sulphate	1	...	
Borax	1	72	
Fritted trace elements	..	1	
Sheep and cattle manure	18	1,251	
Limestone and similar materials	2	...	
Fertilizer sold in small packages	79	...	
Other miscellaneous materials	26	...	
Check meals and fertilizers	22	...	
			1,324
Totals	572		70,866

<sup>1</sup> For distribution of this tonnage see next page.



## MIXED FERTILIZER TONNAGE

Grades Approved for Connecticut

<u>Grade</u>	<u>Tons</u>	<u>Grade</u>	<u>Tons</u>
0-15-30	3,008	8- 6- 2	103
0-20-20	613	8- 8- 8	6
0-25-25	381	8-16- 8	2
5- 5-15	7	8-16-16	2,496
5- 8- 7	1,030	10-10-10	11,793
5-10- 5	2,441	10-20-10	17
5-10-10	6,797	12-12-12	4
6- 3- 6	1,867	16-32-16	4
6- 8- 8	2,557	18-18-18	3
6-12-12	395	20-20-20	10
Total			33,534

Other Grades  
( 50 tons or more )

3- 1- 1	50	8-10-10	1,108
4.75- 4- 0	125	8-12- 6	195
4-10- 4	78	8-12-12	646
4-16-20	156	9- 8- 3	93
5- 4- 0	497	10- 5- 5	1,340
5- 5- 0	130	10- 6- 4	2,488
6- 7- 4	87	10-15-15	499
6- 8- 2	72	12- 5- 7	289
6- 8- 6	101	15- 5- 5	178
6-10- 4	885	15-10-10	2,843
6-10-10	396	20-10- 5	1,244
7- 7- 7	991	20-10-15	66
8- 6- 4	1,239		
Total			15,796

( Less than 50 tons )

2-15-30	6	6- 6- 8	10
3- 1- 3	12	6- 7- 8	10
3- 2- 1	42	7- 8- 5	5
4- 4- 2	5	7-10- 5	38
4- 6- 4	10	8- 7- 7	7
4- 8- 4	15	10- 8- 2	11
4- 8- 5	12	12- 4- 4	16
4-10- 0	37	12- 6- 4	11
5- 1- 1	6	16- 8- 4	43
5- 6-15	5	20- 6- 4	20
5- 9- 6	28	20-10-10	27
5-10- 3	6	23-21-17	15
5-15-30	39	24-12-12	30
5-20-10	10	Other grades	47
6- 4- 7	48		
Total			571

Grand total 49,901

### I. Materials Chiefly Valuable for Nitrogen

Analyses of 72 official samples of nitrogenous materials are given in Table 1. Sixty-two of these met their guaranties and 10 were deficient. The substandard samples included seven cottonseed meals and one sample each of sulphate of ammonia, soybean oil meal and a product known as "Nu Turf Combo".

### II. Materials Chiefly Valuable for Phosphoric Acid

Nine official samples of 20 per cent superphosphate and one sample each of the 18 and 46 per cent grades, together with two samples of precipitated bone and one of phosphate rock, all met their guaranties. Analyses are given in Table 2.

### III. Materials Chiefly Valuable for Potash

Six official samples of muriate of potash, five of cotton hull ashes, three of sulphate of potash and one of sulphate of potash-magnesia, were analyzed; analyses are given in Table 3. Three of the muriate of potash samples were deficient; all other samples met their guaranties.

### IV. Materials Supplying Nitrogen and Phosphoric Acid

This group consists chiefly of dry ground fish and bone meal. Guaranties of "available" phosphoric acid are not required of such natural products, and most of them guarantee only total nitrogen and total phosphoric acid. Nine official samples of dry ground fish, 11 of bone meal and one of "milorganite" (a treated sewage sludge) were analyzed in 1960. Two of the bone meals were found deficient; all other samples met their guaranties. Analyses are given in Table 4.

### V. Materials Supplying Nitrogen and Potash

Previous to the present year the only fertilizer material on the Connecticut market that fell in this category was nitrate of potash, but during the 1959-1960 season one official sample of mixed sodium and potassium nitrates was obtained in addition to two samples of straight nitrate of potash. All three samples met their guaranties; analyses are given in Table 3.

### VI. Mixed Fertilizers

#### Commercial Mixtures

Analyses of 238 official samples of mixed fertilizers are given in Table 5. Results are summarized as follows:

Total number of samples		238
Samples deficient in:		
one item	85	
two items	11	
three items	1	97
Percentage of samples meeting all guaranties		59
Total guaranties made <sup>1</sup>		700
Guaranties not met:		
nitrogen	75	
phosphoric acid	16	
potash	19	110
Percentage met		84

<sup>1</sup> Two hundred and twenty-four samples with three guaranties and 14 with two guaranties (guaranties of minor elements not included).

Eighty-four per cent of all guaranties for major components were substantially met or exceeded.

Twenty-seven samples guaranteed between 0.108 and 1.2 per cent of magnesium (mostly 1.2 per cent) in addition to the major components; all exceeded their guaranties. Eight samples declared between 0.021 and 0.34 per cent of boron (most often 0.11 per cent); of these only one was below guaranty. One of the samples declaring magnesium also carried guaranties of copper, manganese and zinc, and one of the boron-containing fertilizers listed copper, iron, manganese and molybdenum as additional elements; both samples exceeded their guaranties for these minor elements by substantial proportions. One sample carried iron as the only minor element guaranteed; the guaranty was met.

#### Special and Home Mixtures

Fourteen samples of special and home mixtures were analyzed during the year, mostly for tobacco growers. Six years ago there were 150 such samples, but of late years there has been a steady decline - partly because the larger growers made private arrangements for testing their own mixes and partly because less tobacco has been grown.

Since the composition of these 14 samples is not of public interest their analyses are not tabulated in this bulletin.

#### State Purchases of Fertilizer

Fertilizer materials and mixed goods supplied to State institutions on State purchase orders are regularly included in our annual inspection. Fertilizers so supplied are not exempt from payment of registration fees and tonnage taxes unless they are furnished to this Station for experimental purposes.

Samples representing State purchases are indicated in the several tables. They are summarized as follows:

<u>Materials</u>	<u>No. of samples</u>	<u>Reference</u>
Supplying nitrogen	3	Table 1
Supplying phosphoric acid	2	Table 2
Supplying potash	3	Table 3
Supplying nitrogen and phosphoric acid	2	Table 4
Mixed fertilizers	<u>27</u>	Table 5
Total	37	

#### VII. Miscellaneous

Sheep and cattle manures. These products must bear guaranties of nitrogen, either total or "available" phosphoric acid, and potash. Of the 18 official samples analyzed during the 1959-1960 season, 15 met all guaranties, two were deficient in nitrogen only, and one was low in all three components.

Limestone and similar materials. Because the legal definition of "commercial fertilizers" (G.S. 22-105) specifically excludes "marl and lime", no regular inspection of liming materials is made. Occasional samples of limestone, hydrated lime and gypsum ("land plaster") are analyzed for farmers. Analyses of two such samples are given in Table 8.



Fertilizers sold in small packages. Fertilizers sold only in packages of 10 pounds or less net weight are not required to be registered. As a matter of public interest, however, such brands of small package fertilizers as come to the attention of our agent are picked up and analyzed. During the 1959-1960 season 79 such samples were analyzed. Sixty-four of these, or 81 per cent, met all guaranties, and 92 per cent of the total of 224 guaranties of major components were met - a considerably better showing than that of fertilizers sold in 100 lb. bags. Analyses are given in Table 7.

Other miscellaneous materials. Twenty-six other miscellaneous products were examined. Their analyses are given in Table 8, which also includes one official sample each of aluminum sulphate and borax, and one sample each of hydrated lime and limestone submitted by a tobacco grower and a construction company respectively.

Check meals and fertilizers. Collaboration was continued with the various check analysis programs: Eleven vegetable meal samples received from the American Oil Chemists' Society were analyzed for nitrogen, and the usual determinations were made on 11 check fertilizers supplied by Law and Company of Atlanta, Georgia.

#### MAINTENANCE OF GUARANTIES

The maintenance of guaranties as compiled from analyses of ingredient materials and mixed goods (Tables 1-7) is shown in the following tabulation. Deficiencies of 0.1 per cent or less in nitrogen, 0.2 per cent or less in phosphoric acid and potash, and 20 per cent of the claimed value in the case of minor elements, are not counted. The proportion of guaranties substantially met was 87 per cent.

	No. of samples	No. of guaranties	Deficiencies
Nitrate of ammonia	3	3	0
Nitrate of soda	3	6	0
Sulphate of ammonia	3	3	1
Cyanamid	2	2	0
Urea	3	3	0
Castor pomace	5	5	0
Cottonseed meal	28	28	7
Horn and hoof meal	1	1	0
Linseed oil meal	6	6	0
Soybean oil meal	4	4	1
Miscellaneous nitrogenous materials	13	13	1
Superphosphate	11	11	0
Precipitated bone	2	2	0
Phosphate rock	1	1	0
Muriate of potash	6	6	3
Nitrate of potash	2	4	0
Nitrate of soda-potash	1	2	0
Sulphate of potash	3	3	0
Sulphate of potash-magnesia	1	1	0
Cotton hull ashes	5	5	0
Dry ground fish	7	14	0



	<u>No. of samples</u>	<u>No. of guaranties</u>	<u>Deficiencies</u>
Bone meal	11	22	2
"Milorganite"	1	2	0
Mixed fertilizer	238	700	110
Sheep and cattle manure	18	54	5
Small package fertilizers	79	224	19
	<hr/>	<hr/>	<hr/>
Totals	457	1,125	149
Per cent guaranties met			87

TABLE 1.

## ANALYSES OF MATERIALS SUPPLYING CHIEFLY NITROGEN

Station No.	Manufacturer or jobber and dealer	Per cent nitrogen	
		F	G
NITRATE OF AMMONIA			
613	AEROPRILLS. American Cyanamid Co., New York, N. Y. Sampled at Eastern States Farmers' Exchange, Inc., Willimantic.	33.54	33.50
645	AEROPRILLS. American Cyanamid Co., New York, N. Y. State purchase, Southbury Training School, Southbury.	33.52	33.50
890	AEROPRILLS. American Cyanamid Co., New York, N. Y. State purchase, Cheshire Reformatory, Cheshire.	33.50	33.50
NITRATE OF SODA			
636	Chilean, Champion. Chilean Nitrate Sales Corp., New York, N. Y. State purchase, Southbury Training School, Southbury. Sodium found, 26.32%.	16.04	16.00
955	Chilean, Champion. Chilean Nitrate Sales Corp., New York, N. Y. Sampled at New Haven Rendering Co., West Haven. Sodium found, 26.38%.	16.16	16.00
1086	G & O. Goulard & Olena, Inc., Skillman, N. J. Sampled at Cadwell & Jones, Hartford, Conn. Sodium found, 26.00%.	15.92	16.00
SULPHATE OF AMMONIA			
827	American Agricultural Chemical Co., North Weymouth, Mass. Sampled at W. D. Grant Co., Willimantic.	<u>19.30</u>	20.50
1087	Goulard & Olena, Inc., Skillman, N. J. Sampled at Cadwell & Jones, Inc., Hartford, Conn.	20.86	20.75
1025	The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at The Hubbard-Hall Chemical Co., Portland.	20.86	20.00
CYANAMID			
360	AERO. American Cyanamid Co., New York, N. Y. Sampled at The Hubbard-Hall Chemical Co., North Haven.	21.12	21.00
717	Lawn & Garden. American Cyanamid Co., New York, N. Y. Sampled at Leon Ezzel, Inc., Stamford.	21.00	21.00

~~~~~ indicates deficiencies.

TABLE 1.

## ANALYSES OF MATERIALS SUPPLYING CHIEFLY NITROGEN

| Station<br>No.  | Manufacturer or jobber and dealer                                                                                                 | Per cent<br>nitrogen |       |
|-----------------|-----------------------------------------------------------------------------------------------------------------------------------|----------------------|-------|
|                 |                                                                                                                                   | F                    | G     |
| UREA            |                                                                                                                                   |                      |       |
| 886             | Golden. Allied Chemical Corp., Hopewell, Va.<br>Sampled at Walter W. Simmons & Son, Inc.,<br>Granby.                              | 30.28                | 30.00 |
| 402             | AERO. American Cyanamid Co., New York,<br>N. Y. Sampled at Eastern States Farmers'<br>Exchange, Inc., North Haven.                | 45.80                | 45.00 |
| 276             | duPONT URAMITE M. E. I. duPont de Nemours<br>& Co., Wilmington, Del. Sampled at The<br>Hartman Tobacco Co., Bloomfield.           | 38.68                | 38.00 |
| CASTOR POMACE   |                                                                                                                                   |                      |       |
| 401             | Eastern States Farmers' Exchange, Inc., W.<br>Springfield, Mass. Sampled at Eastern<br>States Farmers' Exchange, Inc., No. Haven. | 6.64                 | 5.50  |
| 384             | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. Sampled at American Sumatra To-<br>bacco Corp., Bloomfield.                    | 5.72                 | 5.00  |
| 385             | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. Sampled at American Sumatra To-<br>bacco Corp., Bloomfield.                    | 6.02                 | 5.00  |
| 863             | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. Sampled at Sherwood Waldon, East<br>Windsor Hill.                              | 6.58                 | 5.00  |
| 1081            | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. Sampled at The Hubbard-Hall Chem-<br>ical Co., Windsorville.                   | 6.10                 | 5.00  |
| COTTONSEED MEAL |                                                                                                                                   |                      |       |
| 882             | Owl Brand 41%. The Brode Corp., Memphis,<br>Tenn. Sampled at H. L. Oppenheimer & Sons,<br>West Suffield.                          | 6.62                 | 6.56  |
| 269             | Cocke-Sure 41%. Cocke & Co., Atlanta, Ga.<br>Sampled at Hatheway & Steane Corp., West<br>Suffield.                                | <u>6.34</u>          | 6.56  |
| 270             | Cocke-Sure 41%. Cocke & Co., Atlanta, Ga.<br>Sampled at Hatheway & Steane Corp., West<br>Suffield.                                | <u>6.00</u>          | 6.56  |

~~~~~ indicates deficiencies.

TABLE 1.

ANALYSES OF MATERIALS SUPPLYING CHIEFLY NITROGEN

| Station No. | Manufacturer or jobber and dealer  | Per cent nitrogen |      |
|-------------|--|-------------------|------|
|             |  | F                 | G    |
| 277         | Cocke-Sure 41%. Cocke & Co., Atlanta, Ga. Sampled at American Sumatra Tobacco Corp., Bloomfield.         | 6.96              | 6.56 |
| 278         | Cocke-Sure 41%. Cocke & Co., Atlanta, Ga. Sampled at American Sumatra Tobacco Corp., Bloomfield.         | 7.04              | 6.56 |
| 303         | Cocke-Sure 41%. Cocke & Co., Atlanta, Ga. Sampled at American Sumatra Tobacco Corp., Bloomfield.         | 6.86              | 6.56 |
| 847         | Cocke-Sure 41%. Cocke & Co., Atlanta, Ga. Sampled at L. R. Hawthorne & Son, Hazardville.                 | 7.04              | 6.56 |
| 543         | Corenco. Consolidated Rendering Co., Boston, Mass. Sampled at A. S. Labieniec, Kensington.               | 6.74              | 6.56 |
| 310         | 41%. Farmers Cotton Oil Co., Wilson, N. C. Sampled at Cullman Bros., Inc., Simsbury.                     | 6.72              | 6.56 |
| 755         | Goldenrod 41%. Goldenrod Oil Meal Sales Co., Memphis, Tenn. Sampled at Brookside Nurseries Inc., Darien. | 6.72              | 6.56 |
| 964         | G & O. Goulard & Olena, Inc., Skillman, N. J. Sampled at Silliman's, Inc., New Canaan.                   | 6.56              | 6.56 |
| 296         | Hoco 41%. Hoke Oil & Fertilizer Co., Raeford, N. C. Sampled at Hatheway & Steane Corp., West Suffield.   | 6.48              | 6.56 |
| 299         | Hoco 41%. Hoke Oil & Fertilizer Co., Raeford, N. C. Sampled at Hatheway & Steane Corp., West Suffield.   | 6.66              | 6.56 |
| 300         | Hoco 41%. Hoke Oil & Fertilizer Co., Raeford, N. C. Sampled at Hatheway & Steane Corp., West Suffield.   | 6.56              | 6.56 |
| 311         | Hoco 41%. Hoke Oil & Fertilizer Co., Raeford, N. C. Sampled at Cullman Bros., Inc., Simsbury.            | <u>6.38</u>       | 6.56 |
| 297         | Dixie Brand 41%. Humphreys-Godwin Co., Memphis, Tenn. Sampled at Hatheway & Steane Corp., West Suffield. | <u>6.16</u>       | 6.56 |
| 298         | Dixie Brand 41%. Humphreys-Godwin Co., Memphis, Tenn. Sampled at Hatheway & Steane Corp., West Suffield. | <u>6.22</u>       | 6.56 |

~~~~~ indicates deficiencies.



TABLE 1.

## ANALYSES OF MATERIALS SUPPLYING CHIEFLY NITROGEN

| Station No.      | Manufacturer or jobber and dealer                                                                     | Per cent nitrogen |       |
|------------------|-------------------------------------------------------------------------------------------------------|-------------------|-------|
|                  |                                                                                                       | F                 | G     |
| 304              | Dixie Brand 41%. Humphreys-Godwin Co., Memphis, Tenn. Sampled at Cullman Bros., Inc., Simsbury.       | 6.60              | 6.56  |
| 306              | Dixie Brand 41%. Humphreys-Godwin Co., Memphis, Tenn. Sampled at Cullman Bros., Inc., Simsbury.       | <u>6.36</u>       | 6.56  |
| 831              | Dixie Brand 41%. Humphreys-Godwin Co., Memphis, Tenn. Sampled at L. B. Haas & Co., Hazardville.       | 6.50              | 6.56  |
| 833              | Dixie Brand 41%. Humphreys-Godwin Co., Memphis, Tenn. Sampled at L. B. Haas & Co., Hazardville.       | 6.66              | 6.56  |
| 272              | "Lovit Brand" 41%. L. B. Lovitt & Co., Memphis, Tenn. Sampled at The Hartman Tobacco Co., Bloomfield. | 6.98              | 6.56  |
| 273              | "Lovit Brand" 41%. L. B. Lovitt & Co., Memphis, Tenn. Sampled at The Hartman Tobacco Co., Bloomfield. | 6.72              | 6.56  |
| 274              | "Lovit Brand" 41%. L. B. Lovitt & Co., Memphis, Tenn. Sampled at The Hartman Tobacco Co., Bloomfield. | 6.78              | 6.56  |
| 275              | "Lovit Brand" 41%. L. B. Lovitt & Co., Memphis, Tenn. Sampled at The Hartman Tobacco Co., Bloomfield. | 6.56              | 6.56  |
| 832              | "Lovit Brand" 41%. L. B. Lovitt & Co., Memphis, Tenn. Sampled at L. B. Haas & Co., Hazardville.       | <u>6.30</u>       | 6.56  |
| 305              | Scoco 41%. The Southern Cotton Oil Co., Greenville, Miss. Sampled at Cullman Bros., Inc., Simsbury.   | 6.56              | 6.56  |
| 309              | Scoco 41%. The Southern Cotton Oil Co., Greenville, Miss. Sampled at Cullman Bros., Inc., Simsbury.   | 6.56              | 6.56  |
| HORN & HOOF MEAL |                                                                                                       |                   |       |
| 834              | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at L. B. Haas & Co., Hazardville.             | 13.56             | 13.00 |

~~~~ indicates deficiencies.

TABLE 1.

ANALYSES OF MATERIALS SUPPLYING CHIEFLY NITROGEN

| Station<br>No.   | Manufacturer or jobber and dealer  | Per cent<br>nitrogen |       |
|------------------|--|----------------------|-------|
|                  |  | F                    | G     |
| LINSEED OIL MEAL |  |                      |       |
| 268              | Spencer Kellogg's 32%. Spencer Kellogg & Sons, Inc., Buffalo, N.Y. Sampled at Hatheway & Steane Corp., West Suffield.      | 5.94                 | 5.12  |
| 271              | Spencer Kellogg's 32%. Spencer Kellogg & Sons, Inc., Buffalo, N.Y. Sampled at Hatheway & Steane Corp., West Suffield.      | 5.96                 | 5.12  |
| 279              | Sherwin-Williams 34%. The Sherwin-Williams Co., Cleveland, Ohio. Sampled at Cullman Bros., Inc., Simsbury.                 | 5.92                 | 5.44  |
| 836              | Sherwin-Williams 34%. The Sherwin-Williams Co., Cleveland, Ohio. Sampled at L. B. Haas & Co., Hazardville.                 | 5.92                 | 5.44  |
| 301              | Red Wing 34%. Pittsburgh Plate Glass Co., Red Wing, Minn. Sampled at The Hartman Tobacco Co., Bloomfield.                  | 6.24                 | 5.44  |
| 302              | Red Wing 34%. Pittsburgh Plate Glass Co., Red Wing, Minn. Sampled at The Hartman Tobacco Co., Bloomfield.                  | 6.22                 | 5.44  |
| SOYBEAN OIL MEAL |  |                      |       |
| 307              | Archer Quality 44%. Archer-Daniels-Midland Co., Minneapolis, Minn. Sampled at Cullman Bros., Inc., Simsbury.               | 7.36                 | 7.04  |
| 308              | Archer Quality 44%. Archer-Daniels-Midland Co., Minneapolis, Minn. Sampled at Cullman Bros., Inc., Simsbury.               | 7.16                 | 7.04  |
| 846              | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at L. B. Haas & Co., Hazardville.                                  | <u>6.48</u>          | 7.00  |
| 1076             | Spencer Kellogg's 50%. Spencer Kellogg & Sons, Inc., Buffalo, N.Y. Sampled at The Hubbard-Hall Chemical Co., Windsorville. | 8.00                 | 8.00  |
| MISCELLANEOUS    |  |                      |       |
| 470              | Agrinite. American Agricultural Chemical Co., No. Weymouth, Mass. Sampled at Belmont Feed Co., Cos-Cob.                    | 7.64                 | 7.00  |
| 579              | Borden's "38". The Borden Co., New York, N. Y. Sampled at McArdle's Seed Co., Greenwich.                                   | 38.80                | 38.00 |

         indicates deficiencies.

TABLE 1.

## ANALYSES OF MATERIALS SUPPLYING CHIEFLY NITROGEN

| Station No. | Manufacturer or jobber and dealer  | Per cent nitrogen |       |
|-------------|--|-------------------|-------|
|             |  | N                 | G     |
| 866         | Breck's Feed No Weed. Joseph Breck & Sons, Boston, Mass. Sampled at Paul M. Hubbard Co., Bristol.                      | 26.10             | 25.00 |
| 754         | Dried Blood. Brookside Nurseries, Inc., Darien, Conn. Sampled at Brookside Nurseries, Inc., Darien.                    | 12.58             | 12.50 |
| 934         | duPONT NuGREEN. E. I. duPont de Nemours & Co., Wilmington, Del. Sampled at New Haven Rendering Co., West Haven.        | 45.56             | 45.00 |
| 1106        | Lawn Weed Killer. The Garden Center, Inc., West Hartford. Sampled at The Garden Center, Inc., West Hartford.           | 27.36             | 25.00 |
| 1145        | Blood Tankage. The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at A. N. Pierson, Inc., Cromwell.               | 7.74              | 7.24  |
| 1146        | Calcium Nitrate. The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at A. N. Pierson, Inc., Cromwell.             | 15.56             | 15.50 |
| 1007        | Pax. Pax Co., Salt Lake City, Utah. Sampled at The Hubbard-Hall Chemical Co., Portland.                                | 6.90              | 7.00  |
| 1144        | Platt's Lawn Weed Killer. Frank S. Platt Co., Branford, Conn. Sampled at Frank S. Platt Co., Branford.                 | 31.22             | 25.00 |
| 354         | Bonus Weed & Feed. O. M. Scott & Sons Co., Marysville, Ohio. Sampled at Cheshire Nursery, Inc., Cheshire.              | 26.28             | 25.00 |
| 888         | NuTurf Combo. L. Teweles Seed Co., Milwaukee, Wis. Sampled at S. S. Kresge Co., West Hartford.                         | <u>10.02</u>      | 20.00 |
| 1148        | Vittner's Lawn Weed Killer. Vittner's Garden Center, Manchester, Conn. Sampled at Vittner's Garden Center, Manchester. | 25.20             | 25.00 |

~~~~~ indicates deficiencies.



TABLE 2. ANALYSES OF SUPERPHOSPHATE, ETC.

| Station No. | Manufacturer or jobber and dealer                                                                                               | Per cent phosphoric acid |       |             |       |
|-------------|---------------------------------------------------------------------------------------------------------------------------------|--------------------------|-------|-------------|-------|
|             |                                                                                                                                 | Citrate insoluble        | Total | "Available" |       |
|             |                                                                                                                                 |                          |       | F           | G     |
|             | SUPERPHOSPHATE                                                                                                                  |                          |       |             |       |
| 884         | 18%. American Agricultural Chemical Co., No. Weymouth, Mass. Sampled at H. L. Oppenheimer & Sons, West Suffield.                | 0.33                     | 18.40 | 18.07       | 18.00 |
| 637         | Agri-Phos. American Agricultural Chemical Co., No. Weymouth, Mass. State purchase, Southbury Training School, Southbury.        | 0.43                     | 21.20 | 20.77       | 20.00 |
| 1046        | Agri-Phos. American Agricultural Chemical Co., No. Weymouth, Mass. State purchase, Conn. State Farm for Women, Niantic.         | 0.22                     | 20.25 | 20.03       | 20.00 |
| 327         | Trebo-Phos. American Cyanamid Co., New York, N. Y. Sampled at The Hartman Tobacco Co., Bloomfield.                              | 2.30                     | 48.20 | 45.90       | 46.00 |
| 476         | 20%. Consolidated Rendering Co., Boston, Mass. Sampled at The A. E. Shedd Co., Inc., Norwich.                                   | 0.25                     | 21.90 | 21.65       | 20.00 |
| 701         | 20%. Consolidated Rendering Co., Boston, Mass. State purchase, Fairfield State Hospital, Newtown.                               | 0.20                     | 20.00 | 19.80       | 20.00 |
| 647         | 20%. Davison Chemical Co., Baltimore, Md. Sampled at Check-R-Board Feed Store, New Milford.                                     | 0.90                     | 21.97 | 21.07       | 20.00 |
| 478         | 20%. Eastern States Farmers' Exchange, Inc., West Springfield, Mass. Sampled at Eastern States Farmers' Exchange, Inc., Yantic. | 0.65                     | 21.85 | 21.20       | 20.00 |
| 655         | 20%. The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at Meeker Hardware, Danbury.                                       | 0.65                     | 20.85 | 20.20       | 20.00 |
| 1127        | 20%. Old Fox Agricultural Sales, Inc., East Providence, R. I. Sampled at Old Fox Agricultural Sales, Inc., Hazardville.         | 0.05                     | 20.50 | 20.45       | 20.00 |



|                             |                                                                                                                        |       |                    |       |       |
|-----------------------------|------------------------------------------------------------------------------------------------------------------------|-------|--------------------|-------|-------|
| 874                         | Triple. Old Fox Agricultural Sales, Inc., East Providence, R.I.<br>Sampled at H. L. Oppenheimer & Sons, West Suffield. | 0.42  | 47.30              | 46.88 | 46.00 |
| PRECIPITATED BONE PHOSPHATE |                                                                                                                        |       |                    |       |       |
| 383                         | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at<br>Hatheway & Steane Corp., West Suffield.                  | 0.38  | 45.90              | 45.52 | 38.00 |
| 331                         | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at<br>Cullman Bros., Inc., Simsbury.                           | 0.23  | 42.10              | 41.87 | 38.00 |
| PHOSPHATE ROCK              |                                                                                                                        |       |                    |       |       |
| 710                         | The American Agricultural Chemical Co., No. Weymouth, Mass.<br>Sampled at H. S. Coe & Co. Inc., Waterbury.             | 27.35 | 31.80 <sup>1</sup> | 4.45  | 3.00  |

<sup>1</sup> Guaranteed, 31.0%.

TABLE 3. ANALYSES OF POTASH SALTS, ETC.

| Station<br>No.         | Manufacturer or jobber and dealer                                                                          | Per cent<br>potash |       |
|------------------------|------------------------------------------------------------------------------------------------------------|--------------------|-------|
|                        |                                                                                                            | F                  | G     |
| MURIATE OF POTASH      |                                                                                                            |                    |       |
| 936                    | Consolidated Rendering Co., Boston, Mass.<br>Sampled at New Haven Rendering Co.,<br>West Haven.            | 60.40              | 60.00 |
| 1027                   | Consolidated Rendering Co., Boston, Mass.<br>State purchase, Conn. State Farm for<br>Women, Niantic.       | <u>59.08</u>       | 60.00 |
| 1069                   | Consolidated Rendering Co., Boston, Mass.<br>State purchase, State Highway Dept.,<br>Portland.             | 62.28              | 60.00 |
| 1088                   | Goulard & Olena, Inc., Skillman, N.J.<br>Sampled at Cadwell & Jones, Inc., Hartford.                       | <u>59.24</u>       | 60.00 |
| 651                    | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. Sampled at Big Y Feed Co., Danbury.                     | 60.28              | 60.00 |
| 1191                   | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. State purchase, Conn. Reformatory,<br>Cheshire.         | <u>58.72</u>       | 60.00 |
| NITRATE OF POTASH      |                                                                                                            |                    |       |
| 323 <sup>1</sup>       | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. Sampled at Hatheway & Steane<br>Corp., West Suffield.   | 44.32              | 44.00 |
| 324 <sup>2</sup>       | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. Sampled at Hatheway & Steane<br>Corp., West Suffield.   | 46.80              | 44.00 |
| NITRATE OF SODA-POTASH |                                                                                                            |                    |       |
| 1078 <sup>3</sup>      | Chilean Nitrate Sales Corp., New York, N. Y.<br>Sampled at The Hubbard-Hall Chemical<br>Co., Windsorville. | 15.26              | 14.00 |
| SULPHATE OF POTASH     |                                                                                                            |                    |       |
| 835                    | The Hubbard-Hall Chemical Co., Waterbury,<br>Conn. Sampled at L. B. Haas & Co.,<br>Hazardville.            | 52.00              | 48.00 |
| 573                    | International Minerals & Chemical Corp.,<br>Woburn, Mass. Sampled at Cullman Bros.,<br>Inc., Simsbury.     | 50.00              | 50.00 |
| 574                    | International Minerals & Chemical Corp.,<br>Woburn, Mass. Sampled at Cullman Bros.,<br>Simsbury.           | 52.76              | 50.00 |

~~~~~ indicates deficiencies.

TABLE 3. ANALYSES OF POTASH SALTS, ETC.

| Station No.      | Manufacturer or jobber and dealer  | Per cent potash |            |
|------------------|--|-----------------|------------|
|                  |  | F               | G          |
| 569 <sup>4</sup> | SULPHATE OF POTASH AND MAGNESIA  |                 |            |
|                  | International Minerals & Chemical Corp., Woburn, Mass. Sampled at The Hartman Tobacco Co., Bloomfield.                       | 22.92           | 21.00      |
| 542              | COTTON HULL ASHES  |                 |            |
|                  | Eastern States Farmers' Exchange, Inc., West Springfield, Mass. Sampled at Eastern States Farmers' Exchange, Inc., Buckland. | 37.48           | unit basis |
| 322              | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at Hatheway & Steane Corp., West Suffield, Conn.                     | 41.92           | unit basis |
| 325              | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at Hatheway & Steane Corp., West Suffield.                           | 40.96           | unit basis |
| 328              | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at The Hartman Tobacco Co., Bloomfield.                              | 37.88           | unit basis |
| 329              | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at Cullman Bros., Inc., Simsbury.                                    | 41.16           | unit basis |

<sup>1</sup> Nitrogen: Guaranteed, 13.0%; found, 14.0%.

<sup>2</sup> Nitrogen: Guaranteed, 13.0%; found, 13.68%.

<sup>3</sup> Nitrogen: Guaranteed, 15.0%; found, 15.04%. Sodium: Guaranteed, 18.0%; found, 18.49%.

<sup>4</sup> Magnesium: Guaranteed, 11.0%; found, 11.13%.

TABLE 4. ANALYSES OF GROUND FISH, BONE, ETC.

| Station No.     | Manufacturer or jobber and dealer   | Per cent nitrogen |             |      | Per cent phosphoric acid |             | Mechanical analysis (per cent) |            |              |
|-----------------|---|-------------------|-------------|------|--------------------------|-------------|--------------------------------|------------|--------------|
|                 |   | Ammoniacal        | Total found |      | Total guaranteed         | Total found | Total guaranteed               | Finer than | Coarser than |
|                 |   |                   |             |      |                          |             |                                | 1/50 inch  | 1/50 inch    |
| DRY GROUND FISH |   |                   |             |      |                          |             |                                |            |              |
| 881             | Consolidated Rendering Co., Boston, Mass. Sampled at H. L. Oppenheimer & Sons, West Suffield.       |                   | 10.10       | 9.00 | 5.95                     |             |                                |            |              |
| 571             | Haynie Products, Inc., Wildwood, N. J. Sampled at Cullman Bros., Inc., Simsbury.                    |                   | 10.10       | 9.60 | 8.02                     | 5.00        |                                |            |              |
| 572             | Haynie Products, Inc., Wildwood, N. J. Sampled at Cullman Bros., Inc., Simsbury.                    |                   | 10.18       | 9.60 | 7.90                     | 5.00        |                                |            |              |
| 321             | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at Hatheway & Steane Corp., West Suffield.  |                   | 10.68       | 9.50 | 7.17                     | 5.00        |                                |            |              |
| 326             | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at The Hartman Tobacco Co., Bloomfield.     |                   | 10.50       | 9.50 | 7.67                     | 5.00        |                                |            |              |
| 330             | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at Cullman Bros., Inc., Simsbury.           |                   | 9.82        | 9.50 | 6.44                     | 5.00        |                                |            |              |
| 837             | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at L. B. Haas & Co., Hazardville.           |                   | 10.60       | 9.50 | 7.25                     | 5.00        |                                |            |              |
| BONE MEAL       |   |                   |             |      |                          |             |                                |            |              |
| 741             | American Agricultural Chemical Co., No. Weymouth, Mass. Sampled at H.S. Coe & Co., Inc., Waterbury. | 0.00              | 6.08        | 3.50 | 15.96                    | 18.00       | 3.0                            | 97.0       |              |
| 999             | Armour Agricultural Chemical Co., Carteret, N.J. Sampled at Armour Fertilizer Works, S. Windsor.    | 0.00              | 2.80        | 2.30 | 25.60                    | 23.00       | 52.0                           | 48.0       |              |



|      |   |      |                   |      |                    |       |      |      |
|------|---|------|-------------------|------|--------------------|-------|------|------|
| 753  | Brookside Nurseries, Inc., Darien, Conn. Sampled at Brookside Nurseries, Inc., Darien.                                  |      |                   |      | 20.60              | 21.00 | 8.0  | 92.0 |
| 739  | The Peter Cascio Nursery, West Hartford, Conn. Sampled at Peter Cascio Nursery, West Hartford.                          | 0.00 | 6.66              | 3.50 | 19.55              | 22.00 | 14.0 | 86.0 |
| 666  | Consolidated Rendering Co., Boston, Mass. State purchase, State Library, Hartford.                                      | 0.00 | 2.42              | 2.00 | 26.45              | 22.00 | 63.0 | 37.0 |
| 757  | Consolidated Rendering Co., Boston, Mass. Sampled at Libner Grain Co. Inc., Norwalk.                                    | 0.00 | 2.72              | 2.00 | 26.70              | 22.00 | 55.0 | 45.0 |
| 1006 | Consolidated Rendering Co., Boston, Mass. Sampled at Blue Hills Clinic & Hospital, Hartford.                            | 0.00 | 2.78              | 2.00 | 27.30              | 22.00 | 54.0 | 46.0 |
| 447  | Faesy & Besthoff, Inc., New York, N.Y. Sampled at McArdle's Seed Co., Greenwich.  | 0.00 | 2.74              | 2.47 | 26.90              | 23.00 | 50.0 | 50.0 |
| 961  | Goulard & Olena, Inc., Skillman, N.J. Sampled at Silliman's, Inc., New Canaan.  | 0.00 | 2.64              | 2.40 | 26.60              | 20.00 | 60.0 | 40.0 |
| 596  | The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at Willis Distributors, Bridgeport.                             | 0.00 | 2.28              | 2.00 | 27.35              | 23.00 | 65.0 | 35.0 |
| 742  | Lebanon Chemical Corp., Lebanon, Pa. Sampled at Leon Ezzell Inc., Stamford.   | 0.00 | 2.96              | 2.30 | 25.87 <sup>1</sup> |       | 54.0 | 46.0 |
| 703  | MILORGANITE<br>Sewerage Commission of the City of Milwaukee, Milwaukee, Wis. Sampled at H.S. Coe & Co. Inc., Waterbury. | 0.00 | 5.96 <sup>2</sup> | 5.50 | 4.65 <sup>3</sup>  |       |      |      |

~~~~ indicates deficiencies.

- <sup>1</sup> "Available" phosphoric acid: Guaranteed, 15.0%; found, 16.69%.
- <sup>2</sup> Water-soluble organic nitrogen, 0.49%; insoluble organic nitrogen, 5.47%.
- <sup>3</sup> "Available" phosphoric acid: Guaranteed, 4.0%; found, 3.93%.

TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No.       | Manufacturer and brand                                         | Place of sampling |
|-------------------|----------------------------------------------------------------|-------------------|
|                   | <u>AGRICULTURAL PRODUCTS CO.</u><br>Providence, R. I.          |                   |
| 615               | Guardian 8-6-4 Gro Green Lawn Fertilizer                       | Willimantic       |
| 607               | Super Turf King 8-6-4 Lawn Food                                | Milford           |
| 606               | Turf King Lawn & Garden Fertilizer 6-10-4                      | Milford           |
|                   | <u>AGRICULTURAL SUPPLY CO.</u><br>West Haven, Conn.            |                   |
| 495               | Yale Special Mixture 8-6-2                                     | Kensington        |
|                   | <u>AMERICAN AGRICULTURAL CHEMICAL CO., No. Weymouth, Mass.</u> |                   |
| 885               | AA Fertilizer 0-15-30                                          | West Suffield     |
| 709 <sup>1</sup>  | AA Fertilizer 5-10-10-1.2 Magnesium                            | Waterbury         |
| 1067 <sup>2</sup> | AA Fertilizer 10-6-4                                           | Middletown        |
| 826               | AA Fertilizer 10-10-10                                         | Willimantic       |
| 829               | AA Fertilizer 15-10-10                                         | Willimantic       |
| 445               | AA Plant Food 5-10-5                                           | Greenwich         |
| 667 <sup>2</sup>  | AA Plant Food 5-10-5                                           | Hartford          |
| 705               | AA Plant Food 5-10-5                                           | Waterbury         |
| 448               | Agrico Country Club 8-6-4                                      | Greenwich         |
| 541               | Agrico Country Club 10-6-4                                     | Manchester        |
| 716               | Agrico for Azaleas, Camellias & Rhododendrons 6-10-4           | Stamford          |
| 492               | Agrico for Gardens 5-10-5                                      | Manchester        |
| 552               | Agrico for Lawns, Trees & Shrubs 6-10-4                        | Southington       |
| 550               | Agrico for New England 5-8-7                                   | Southington       |
| 551 <sup>3</sup>  | Agrico for Potatoes 5-10-10-1.2 Magnesium                      | Southington       |
| 456               | Agrico for Turf 10-6-4                                         | Cos-Cob           |
| 449               | Agrico Pesticide & Turf Food 6-10-4                            | Greenwich         |
| 446               | Agrico Rose Food 5-9-6                                         | Greenwich         |
|                   | <u>ARMOUR AGRICULTURAL CHEMICAL CO., Carteret, N. J.</u>       |                   |
| 1002              | Armour Armorganic Plant Food 5-5-0                             | South Windsor     |
| 883               | Armour Big Crop Fertilizer 0-20-20                             | West Suffield     |

~~~~ indicates deficiencies.

<sup>1</sup> Magnesium: Guaranteed, 1.2%; found, 1.24%.

## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |             | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |              |
|-----------------------|------------|-------------------|---------------------|-------------|------------------------------|-------|--------------------------|---------------------|--------------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total       | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total        |
| 0.00                  | 7.52       | 0.28              | 0.50                | 8.30        | 0.20                         | 6.70  | 6.50                     | 3.94                | 4.87         |
| 0.69                  | 5.96       | 0.24              | 1.15                | 8.04        | 0.43                         | 6.55  | 6.12                     | 3.86                | 4.46         |
| 0.00                  | 6.08       | 0.25              | 0.13                | 6.46        | 0.28                         | 11.25 | 10.97                    | 2.93                | 4.39         |
| 0.00                  | 4.84       | 2.69              | 0.37                | 7.90        | 0.15                         | 7.05  | 6.90                     | 1.78                | 3.26         |
| 0.00                  | 4.90       | 0.00              | 0.20                | 5.10        | 0.27                         | 15.30 | 15.03                    | 26.43               | 31.52        |
| 0.25                  | 8.88       | 0.23              | 0.00                | <u>9.36</u> | 0.65                         | 11.70 | 11.05                    | 7.74                | <u>9.29</u>  |
| 1.64                  | 7.64       | 0.20              | 1.18                | 10.66       | 0.60                         | 7.65  | 7.05                     | 3.05                | 4.62         |
| 1.31                  | 13.12      | 0.47              | 0.00                | 14.90       | 0.50                         | 10.85 | 10.35                    | 6.72                | 10.40        |
| 0.00                  | 4.24       | 0.20              | 0.00                | <u>4.44</u> | 0.35                         | 11.00 | 10.65                    | 7.89                | 10.44        |
| 0.39                  | 4.16       | 0.44              | 0.23                | <u>5.22</u> | 0.35                         | 10.42 | 10.07                    | 4.30                | 5.19         |
| 0.78                  | 4.04       | 0.20              | 0.16                | 5.18        | 0.35                         | 10.45 | 10.10                    | 2.51                | 5.34         |
| 0.00                  | 5.24       | 1.05              | 1.55                | <u>7.84</u> | 0.45                         | 10.92 | 10.47                    | 2.15                | 5.73         |
| 0.76                  | 8.44       | 0.19              | 0.43                | <u>9.82</u> | 0.45                         | 7.20  | 6.75                     | 4.06                | 4.21         |
| 0.30                  | 4.00       | 1.10              | 0.40                | <u>5.80</u> | 0.28                         | 7.20  | 6.75                     | 4.06                | 4.21         |
| 0.00                  | 3.12       | 0.95              | 0.57                | <u>4.64</u> | 0.28                         | 6.50  | 6.22                     | 3.88                | 4.68         |
| 0.00                  | 2.88       | 3.17              | 0.47                | <u>6.52</u> | 0.55                         | 10.90 | 10.35                    | 2.52                | 4.46         |
| 0.48                  | 4.16       | 0.35              | 0.41                | 5.40        | 0.58                         | 11.00 | 10.42                    | 3.71                | 5.22         |
| 1.30                  | 3.20       | 0.26              | 0.00                | <u>4.76</u> | 0.43                         | 10.55 | 10.12                    | 1.02                | 4.68         |
| 0.00                  | 2.68       | 3.15              | 3.83                | <u>9.66</u> | 0.45                         | 9.10  | 8.69                     | 5.86                | 7.71         |
| 0.52                  | 4.72       | 0.26              | 0.44                | 5.94        | 0.65                         | 10.75 | 10.10                    | 8.37                | <u>9.69</u>  |
| 0.00                  | 2.44       | 2.23              | 0.47                | 5.14        | 0.50                         | 6.80  | 6.30                     | 0.33                | 4.36         |
| 0.00                  | 0.00       | 0.78              | 4.28                | 5.06        | 0.65                         | 10.97 | 10.32                    | 3.76                | 4.21         |
|                       |            |                   |                     |             | 0.55                         | 9.65  | 9.10                     | 5.03                | 6.28         |
| 0.00                  | 0.00       | 0.78              | 4.28                | 5.06        | 0.70                         | 22.01 | 21.31                    | 13.35               | <u>18.60</u> |

<sup>2</sup> State purchase.<sup>3</sup> Magnesium: Guaranteed, 1.2%; found, 1.21%.



TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No. | Manufacturer and brand   | Place of sampling |
|-------------|--|-------------------|
| 997         | Armour Big Crop Fertilizer 5-8-7                                   | South Windsor     |
| 994         | Armour Big Crop Fertilizer 7-7-7                                   | South Windsor     |
| 998         | Armour Big Crop Fertilizer 10-10-10                                | South Windsor     |
| 1001        | Armour Vertagreen for Acid Loving Plants 5-10-10                   | South Windsor     |
| 995         | Armour Vertagreen Complete Plant Food for Commercial Crops 3-12-12 | South Windsor     |
| 851         | Armour Vertagreen Plant Food 5-10-5                                | Thompsonville     |
| 1089        | Armour Vertagreen Plant Food 5-10-5                                | South Windsor     |
| 996         | Armour Vertagreen Plant Food for Commercial Crops 6-12-12          | South Windsor     |
| 669         | Armour Vertagreen Plant Food for Turf & Trees 10-6-4               | Bloomfield        |
| 992         | Armour Vertagreen Turf Maker 8-6-2                                 | South Windsor     |
|             | <u>ASGROW SEED CO.</u><br>New Haven, Conn.                         |                   |
| 1142        | Gro-Sod Lawn Food 15-5-5   | Milford           |
| 1141        | Weed-Nix Lawn Food 6-10-4  | Milford           |
|             | <u>F. A. BARTLETT TREE EXPERT CO.</u><br>Stamford, Conn.           |                   |
| 991         | Bartlett Green Tree Food 6-8-6                                     | Danbury           |
|             | <u>BONNIE GREEN PRODUCTS CO.</u><br>Philadelphia, Pa.              |                   |
| 593         | Bonnie Green Complete Lawn & Garden Food 16-8-9                    | Hamden            |
|             | <u>JOSEPH BRECK &amp; SONS</u><br>Boston, Mass.                    |                   |
| 590         | Breck's Greenite 5-4-0   | Hamden            |
| 589         | Breck's New Improved Turf Gro 20-6-4                               | Hamden            |
| 867         | Breck's Turf Gro 8-6-2   | Bristol           |
|             | <u>BROOKSIDE NURSERIES, INC.</u><br>Darien, Conn.                  |                   |
| 752         | Brookside's Natures Nutrients 6-6-8                                | Darien            |

~~~~ indicates deficiencies.



## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |              | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|--------------|------------------------------|-------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total        | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total |
| 0.37                  | 3.84       | 0.45              | 0.00                | 4.66         | 0.40                         | 9.20  | 8.80                     | 5.14                | 7.27  |
| 0.40                  | 5.48       | 0.38              | 0.12                | <u>6.38</u>  | 0.50                         | 8.80  | 8.30                     | 4.75                | 7.10  |
| 0.36                  | 8.44       | 0.40              | 0.00                | <u>9.20</u>  | 0.43                         | 12.00 | 11.57                    | 5.64                | 10.19 |
| 0.18                  | 4.08       | 0.16              | 0.74                | 5.16         | 0.58                         | 10.92 | 10.34                    | 8.35                | 10.66 |
| 0.00                  | 3.12       | 0.26              | 0.00                | 3.38         | 0.78                         | 13.85 | 13.07                    | 10.42               | 12.16 |
| 0.13                  | 4.80       | 0.12              | 0.15                | 5.20         | 0.85                         | 11.70 | 10.85                    | 1.24                | 5.44  |
| 0.29                  | 3.76       | 0.28              | 0.95                | 5.28         | 1.00                         | 11.35 | 10.35                    | 3.49                | 5.07  |
| 0.68                  | 5.20       | 0.02              | 0.10                | 6.00         | 0.65                         | 13.50 | 12.85                    | 11.04               | 12.46 |
| 0.24                  | 7.72       | 0.36              | 1.56                | <u>9.88</u>  | 0.60                         | 7.90  | 7.30                     | 3.29                | 4.30  |
| 0.37                  | 2.96       | 0.84              | 3.53                | <u>7.70</u>  | 0.80                         | 7.65  | 6.85                     | 2.20                | 2.88  |
| 0.29                  | 5.20       | 4.08              | 4.21                | <u>13.78</u> | 0.50                         | 6.85  | 6.35                     | 2.02                | 6.18  |
| 0.49                  | 4.80       | 0.24              | 0.75                | <u>6.28</u>  | 0.70                         | 10.90 | 10.20                    | 3.86                | 4.55  |
| 0.44                  | 4.36       | 0.28              | 0.64                | <u>5.72</u>  | 0.68                         | 9.22  | 8.54                     | 5.34                | 6.65  |
| 0.37                  | 3.48       | 12.76             | 0.19                | 16.80        | 0.05                         | 10.55 | 10.50                    | 11.34               | 11.97 |
| 0.00                  | 0.00       | 0.37              | 4.47                | <u>4.84</u>  | 1.05                         | 6.72  | 5.67                     |                     |       |
| 0.86                  | 5.00       | 0.00              | 2.02                | <u>12.12</u> | 0.33                         | 6.95  | 6.62                     | 1.67                | 4.49  |
| 0.45                  | 5.56       | 1.04              | 1.35                | <u>8.40</u>  | 0.40                         | 6.55  | 6.15                     | 0.49                | 2.31  |
| 0.24                  | 0.12       | 0.64              | 5.50                | 6.50         | 3.02                         | 10.64 | 7.62                     | 0.50                | 9.54  |

TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No.        | Manufacturer and brand                              | Place of sampling  |
|--------------------|-----------------------------------------------------|--------------------|
|                    | <u>CADWELL &amp; JONES, INC.</u><br>Hartford, Conn. |                    |
| 580                | C & J Hi-Organic Fertilizer 10-6-4                  | Kensington         |
| 707                | C & J Lawn Food with Weed Killer<br>20-10-5         | Hartford           |
| 708                | C & J Plant Food 5-10-5                             | Hartford           |
|                    | <u>CONSOLIDATED RENDERING CO.</u><br>Boston, Mass.  |                    |
| 957                | Corenco 0-15-30                                     | West Haven         |
| 935                | Corenco 0-20-20                                     | West Haven         |
| 616 <sup>2,4</sup> | Corenco 0-20-20 with Boron                          | Storrs             |
| 644 <sup>2,5</sup> | Corenco 0-20-20 with Boron                          | Southbury          |
| 1124               | Corenco 5-5-15 Tobacco Starter                      | Springfield, Mass. |
| 855                | Corenco 5-8-7                                       | East Windsor Hill  |
| 500                | Corenco 5-10-5                                      | Shelton            |
| 913 <sup>2</sup>   | Corenco 5-10-5                                      | Cheshire           |
| 704                | Corenco 5-10-5 Home Garden                          | Waterbury          |
| 931                | Corenco 5-10-5 Rose Special                         | West Haven         |
| 391                | Corenco 5-10-10                                     | New Haven          |
| 1151 <sup>6</sup>  | Corenco 5-10-10-1.2 Magnesium                       | West Haven         |
| 1149               | Corenco 5-10-10 Liquid Fertilizer<br>Concentrate    | West Haven         |
| 1122               | Corenco 6-3-6 Perfection                            | Springfield, Mass. |
| 1123               | Corenco 6-3-6 Premium                               | Springfield, Mass. |
| 856 <sup>7</sup>   | Corenco 6-8-8-1.2 Magnesium                         | East Windsor Hill  |
| 611                | Corenco 7-7-7                                       | Willimantic        |
| 857                | Corenco 7-7-7                                       | East Windsor Hill  |
| 930                | Corenco 7-7-7 Rhododendron                          | West Haven         |
| 498                | Corenco 8-6-4 Landscape                             | Derby              |
| 499                | Corenco 8-6-4 Turf Green                            | Shelton            |
| 1080               | Corenco 8-6-4 Turf Green                            | Willimantic        |
| 1114               | Corenco 8-6-4 Turf Green Chlordane                  | Willimantic        |
| 956 <sup>8</sup>   | Corenco 8-12-12-.9 Magnesium                        | West Haven         |
| 933                | Corenco 8-16-16                                     | West Haven         |
| 1150               | Corenco 10-5-5 Liquid Green                         | West Haven         |

~~~~~ indicates deficiencies.

<sup>2</sup> State purchase.

<sup>4</sup> Boron: Guaranteed, 0.11%; found, 0.14%.

<sup>5</sup> Boron: Guaranteed, 0.11%; found, 0.12%.

## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |              | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |              |
|-----------------------|------------|-------------------|---------------------|--------------|------------------------------|-------|--------------------------|---------------------|--------------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total        | Citrate-<br>insoluble        | Total | So-called<br>"available" | As<br>muriate       | Total        |
| 0.48                  | 4.44       | 3.06              | 1.38                | <u>9.36</u>  | 0.38                         | 7.17  | 6.79                     | 2.99                | 5.31         |
| 0.50                  | 2.60       | 11.68             | 2.40                | <u>17.18</u> | 0.35                         | 10.12 | <u>9.77</u>              | 3.53                | 6.45         |
| 0.94                  | 3.00       | 0.76              | 0.00                | <u>4.70</u>  | 0.23                         | 11.00 | <u>10.77</u>             | 6.75                | 8.53         |
|                       |            |                   |                     |              |                              |       |                          |                     |              |
|                       |            |                   |                     |              | 0.12                         | 15.15 | 15.03                    | 25.09               | <u>27.32</u> |
|                       |            |                   |                     |              | 0.20                         | 20.55 | 20.35                    | 18.21               | <u>20.26</u> |
|                       |            |                   |                     |              | 0.17                         | 19.55 | <u>19.38</u>             | 18.92               | 20.26        |
|                       |            |                   |                     |              | 0.33                         | 20.65 | <u>20.32</u>             | 18.02               | <u>19.30</u> |
| 0.00                  | 0.00       | 2.80              | 2.22                | 5.02         | 0.30                         | 5.70  | 5.40                     | 0.76                | <u>15.90</u> |
| 1.13                  | 3.32       | 0.55              | 0.00                | 5.00         | 0.35                         | 8.55  | 8.20                     | 4.57                | 7.27         |
| 0.98                  | 3.76       | 0.52              | 0.00                | 5.26         | 0.20                         | 11.40 | 11.20                    | 4.36                | 5.44         |
| 0.67                  | 3.72       | 0.68              | 0.15                | 5.22         | 0.08                         | 10.60 | 10.52                    | 4.99                | 5.31         |
| 0.91                  | 3.28       | 0.68              | 0.15                | 5.02         | 0.45                         | 10.85 | 10.40                    | 3.61                | 6.28         |
| 0.25                  | 2.40       | 1.44              | 1.25                | 5.34         | 0.25                         | 12.62 | 12.37                    | 4.89                | 5.84         |
| 1.01                  | 3.88       | 0.24              | 0.13                | 5.26         | 0.45                         | 10.80 | 10.35                    | 9.02                | 10.08        |
| 0.93                  | 3.84       | 0.64              | 0.21                | 5.62         | 0.43                         | 10.60 | 10.17                    | 7.85                | 10.26        |
|                       |            |                   |                     |              |                              |       |                          |                     |              |
| 0.34                  | 3.44       | 1.44              | 0.00                | 5.22         | 0.00                         | 10.00 | 10.00                    | 5.58                | 10.19        |
| 0.00                  | 0.00       | 2.84              | 3.16                | 6.00         | 0.30                         | 3.92  | 3.62                     | 0.31                | 6.21         |
| 0.00                  | 0.00       | 2.52              | 3.00                | <u>5.52</u>  | 0.00                         | 3.20  | 3.20                     |                     | 6.18         |
| 0.96                  | 4.00       | 0.60              | 0.00                | <u>5.56</u>  | 0.20                         | 8.75  | 8.55                     | 0.44                | 7.91         |
| 1.50                  | 4.96       | 0.36              | 0.00                | <u>6.82</u>  | 0.15                         | 7.45  | 7.30                     | 5.27                | 7.03         |
| 0.86                  | 5.48       | 0.66              | 0.00                | <u>7.00</u>  | 0.15                         | 7.80  | 7.65                     | 5.60                | 7.47         |
| 1.41                  | 5.60       | 0.24              | 0.11                | 7.36         | 0.55                         | 8.15  | 7.60                     | 4.08                | 7.06         |
| 0.14                  | 4.88       | 2.60              | 0.50                | 8.12         | 0.38                         | 7.60  | 7.22                     | 3.74                | 4.55         |
| 0.18                  | 4.00       | 1.36              | 2.80                | 8.34         | 0.35                         | 6.57  | 6.22                     | 4.02                | 4.49         |
| 1.98                  | 3.84       | 1.04              | 3.38                | 10.24        | 0.22                         | 6.50  | 6.28                     | 4.32                | 5.03         |
| 0.16                  | 4.00       | 0.74              | 2.30                | <u>7.20</u>  | 0.55                         | 6.55  | 6.00                     | 4.52                | 5.00         |
| 0.86                  | 5.40       | 1.20              | 0.12                | <u>7.58</u>  | 0.53                         | 12.80 | 12.27                    | 8.23                | <u>11.62</u> |
| 1.44                  | 5.76       | 0.60              | 0.00                | <u>7.80</u>  | 0.45                         | 17.10 | 16.65                    | 13.81               | <u>16.55</u> |
| 0.16                  | 1.82       | 7.66              | 0.00                | <u>9.64</u>  | 0.00                         | 5.10  | 5.10                     | 4.48                | 5.60         |

<sup>6</sup> Magnesium: Guaranteed, 1.2%; found, 1.02%.<sup>7</sup> Magnesium: Guaranteed, 1.2%; found, 1.59%.<sup>8</sup> Magnesium: Guaranteed, .9%; found, .86%.



TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No.       | Manufacturer and brand                            | Place of sampling |
|-------------------|---|-------------------|
| 497               | Corenco 10-6-4 Golf & Lawn                        | Derby             |
| 635 <sup>2</sup>  | Corenco 10-6-4 Golf & Lawn                        | Southbury         |
| 665 <sup>2</sup>  | Corenco 10-6-4 Golf & Lawn                        | Hartford          |
| 702 <sup>2</sup>  | Corenco 10-6-4 Golf & Lawn                        | Newtown           |
| 915 <sup>2</sup>  | Corenco 10-6-4 Golf & Lawn                        | New Britain       |
| 1193 <sup>2</sup> | Corenco 10-6-4 Golf & Lawn                        | Newtown           |
| 880               | Corenco 10-6-4 Granular Form                      | West Suffield     |
| 928               | Corenco 10-8-2 Timberline                         | Wethersfield      |
| 932               | Corenco 10-10-10                                  | West Haven        |
| 1084              | Corenco 10-10-10                                  | Wilson            |
| 778               | Corenco Organic Turf Fertilizer<br>4.75-4-0       | Thompsonville     |
|                   | <u>THE DAVEY TREE EXPERT CO.</u><br>Kent, Ohio    |                   |
| 472               | Davey Tree Food 12-4-4                            | Old Greenwich     |
|                   | <u>R. G. DAVIS CO.</u><br>New Haven, Conn.        |                   |
| 389               | Organo 10-5-5                                     | New Haven         |
|                   | <u>DAVISON CHEMICAL CO.</u><br>Baltimore, Md.     |                   |
| 1079              | 0-15-30 Davco Granulated Fertilizer               | Willimantic       |
| 1113 <sup>9</sup> | 0-15-30 Davco Granulated Fertilizer<br>with Boron | Willimantic       |
| 577               | 5-10-5 Davco Turf & Garden Food                   | Wallingford       |
| 405               | 5-10-10 Davco Granulated 3G Fertilizer            | Wallingford       |
| 646               | 10-10-10 Davco Granulated 3G Fertilizer           | New Milford       |
| 404               | 15-10-10 Davco Granulated 3G Fertilizer           | Wallingford       |
|                   | <u>DAYTON FERTILIZER CORP.</u><br>Dayton, N. J.   |                   |
| 575               | Daytonite Plant Food 10-6-4                       | Wallingford       |
| 632               | Daytonite Plant Food 10-6-4                       | Manchester        |
| 634               | Grand Garden Plant Food 6-10-4                    | Manchester        |
| 576               | Lawn Treat Lawn & Garden Fertilizer<br>5-10-5     | Wallingford       |
| 738               | Lawn Treat Lawn & Garden Fertilizer<br>5-10-5     | West Hartford     |

~~~~ indicates deficiencies  
<sup>2</sup> State purchase.



## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |       | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|-------|------------------------------|-------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total |
| 0.00                  | 4.96       | 3.90              | 1.02                | 9.88  | 0.38                         | 6.60  | 6.22                     | 3.63                | 4.49  |
| 0.00                  | 4.56       | 2.25              | 2.11                | 8.92  | 0.23                         | 6.85  | 6.62                     | 3.73                | 5.13  |
| 0.00                  | 4.80       | 2.03              | 2.17                | 9.00  | 0.20                         | 6.67  | 6.47                     | 3.86                | 5.00  |
| 0.00                  | 4.92       | 4.04              | 1.04                | 10.00 | 0.33                         | 6.80  | 6.47                     | 3.74                | 4.65  |
| 0.26                  | 4.72       | 1.86              | 1.70                | 8.54  | 0.13                         | 6.90  | 6.77                     | 3.90                | 5.25  |
| 0.00                  | 4.76       | 3.48              | 1.94                | 10.18 | 0.15                         | 6.15  | 6.00                     | 3.65                | 4.55  |
| 1.51                  | 8.20       | 0.29              | 0.00                | 10.00 | 0.07                         | 6.15  | 6.08                     | 2.63                | 4.36  |
| 0.00                  | 2.40       | 3.68              | 3.94                | 10.02 | 0.28                         | 8.45  | 8.17                     | 1.95                | 3.32  |
| 2.06                  | 6.88       | 0.66              | 0.00                | 9.60  | 0.17                         | 10.85 | 10.68                    | 6.04                | 10.22 |
| 1.33                  | 7.68       | 0.52              | 0.11                | 9.64  | 0.30                         | 11.12 | 10.82                    | 8.15                | 10.22 |
| 0.00                  | 0.00       | 0.40              | 4.60                | 5.00  | 0.75                         | 8.24  | 7.49                     |                     |       |
| 0.88                  | 9.72       | 0.50              | 0.76                | 11.86 | 0.53                         | 4.80  | 4.27                     | 3.49                | 4.08  |
| 0.53                  | 5.92       | 2.40              | 1.15                | 10.00 | 0.30                         | 6.15  | 5.85                     | 4.87                | 5.90  |
|                       |            |                   |                     |       | 0.60                         | 18.57 | 17.97                    | 24.48               | 28.88 |
|                       |            |                   |                     |       | 0.85                         | 17.07 | 16.22                    | 26.03               | 28.80 |
| 0.94                  | 3.92       | 0.32              | 0.10                | 5.28  | 0.30                         | 10.50 | 10.20                    | 3.21                | 6.65  |
| 0.63                  | 4.52       | 0.11              | 0.00                | 5.26  | 0.20                         | 10.60 | 10.40                    | 8.57                | 10.12 |
| 0.34                  | 6.56       | 2.56              | 0.00                | 9.46  | 0.30                         | 10.72 | 10.42                    | 8.76                | 10.51 |
| 2.87                  | 11.08      | 0.37              | 0.00                | 14.32 | 0.33                         | 11.22 | 10.89                    | 9.92                | 10.40 |
| 0.81                  | 4.72       | 2.28              | 2.19                | 10.00 | 0.40                         | 6.50  | 6.10                     | 4.66                | 5.00  |
| 0.41                  | 6.40       | 2.48              | 0.77                | 10.06 | 0.30                         | 6.72  | 6.42                     | 4.09                | 4.78  |
| 1.00                  | 4.64       | 0.48              | 0.18                | 6.30  | 0.40                         | 10.57 | 10.17                    | 3.16                | 5.07  |
| 0.79                  | 3.76       | 0.64              | 0.37                | 5.56  | 0.60                         | 11.25 | 10.65                    | 4.01                | 5.57  |
| 0.83                  | 2.60       | 0.32              | 1.45                | 5.20  | 1.30                         | 11.30 | 10.00                    | 5.48                | 6.38  |

<sup>9</sup> Boron: Guaranteed, 0.34%; found, 0.13%.

TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No.       | Manufacturer and brand                                                      | Place of sampling |
|-------------------|-----------------------------------------------------------------------------|-------------------|
| 633               | Lawn Treat Lawn & Garden Fertilizer<br>10-6-4                               | Manchester        |
| 671               | Lawn Treat Lawn & Garden Fertilizer<br>10-6-4                               | West Hartford     |
|                   | <u>EASTERN STATES FARMERS'</u><br>EXCHANGE, INC.<br>West Springfield, Mass. |                   |
| 612 <sup>10</sup> | Eastern States 0-15-30 with Boron                                           | Willimantic       |
| 477               | Eastern States 0-25-25                                                      | Yantic            |
| 398 <sup>11</sup> | Eastern States 5-10-10 SM with<br>1.2 Magnesium                             | North Haven       |
| 614 <sup>12</sup> | Eastern States 8-16-16-.6 Magnesium                                         | Willimantic       |
| 399 <sup>13</sup> | Eastern States 10-10-10-.6 Magnesium                                        | North Haven       |
| 854 <sup>14</sup> | Eastern States 10-15-15-1.2 Magnesium                                       | East Windsor Hill |
| 848 <sup>15</sup> | Eastern States 10-15-15 LC with<br>1.2 Magnesium                            | Hazardville       |
| 400               | Eastern States 15-10-10                                                     | North Haven       |
| 494 <sup>16</sup> | Eastern States Green Lawn 10-5-5-1.2<br>Magnesium                           | Buckland          |
|                   | <u>THE ESPOMA CO.</u><br>Millville, N. J.                                   |                   |
| 407               | Espoma 3-2-1                                                                | Greenwich         |
| 409               | Holly-Tone 4-6-4                                                            | Greenwich         |
|                   | <u>FAESY &amp; BESTHOFF, INC.</u><br>New York, N. Y.                        |                   |
| 780 <sup>17</sup> | F & B All-Purpose Pelletized 10-6-4                                         | Thompsonville     |
| 779 <sup>18</sup> | F & B Evergreen Food 7-7-7                                                  | Thompsonville     |
|                   | <u>THE GARDEN CENTER INC.</u><br>West Hartford, Conn.                       |                   |
| 1105              | Garden Center Lawn Fertilizer 10-6-4                                        | West Hartford     |

~~~~~ indicates deficiencies.

<sup>10</sup> Boron: Guaranteed, .2%; found, .32%.

<sup>11</sup> Magnesium: Guaranteed, 1.2%; found, 1.59%.

<sup>12</sup> Magnesium: Guaranteed, .6%; found, .93%.

<sup>13</sup> Magnesium: Guaranteed, .6%; found, .92%.

<sup>14</sup> Magnesium: Guaranteed, 1.2%; found, 1.20%.

## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |             | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|-------------|------------------------------|-------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total       | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total |
| 0.57                  | 5.80       | 1.84              | 1.79                | 10.00       | 0.17                         | 5.90  | <u>5.73</u>              | 3.71                | 4.78  |
| 0.62                  | 4.20       | 0.28              | 4.04                | <u>9.14</u> | 0.45                         | 7.72  | 7.27                     | 4.75                | 4.84  |
|                       |            |                   |                     |             | 0.50                         | 15.65 | 15.15                    | 27.73               | 30.44 |
|                       |            |                   |                     |             | 0.30                         | 25.20 | 24.90                    | 24.86               | 25.93 |
| 1.10                  | 3.76       | 0.40              | 0.00                | 5.26        | 0.40                         | 11.05 | 10.65                    | 8.87                | 10.15 |
| 1.82                  | 5.44       | 0.48              | 0.16                | 7.90        | 0.53                         | 16.55 | 16.02                    | 14.46               | 17.71 |
| 2.17                  | 6.96       | 0.76              | 0.11                | 10.00       | 0.25                         | 10.60 | 10.35                    | 9.40                | 10.78 |
| 1.69                  | 7.20       | 0.77              | 0.00                | <u>9.66</u> | 0.53                         | 16.57 | 16.04                    | 7.60                | 15.90 |
| 2.38                  | 7.12       | 0.68              | 0.00                | 10.18       | 0.33                         | 16.52 | 16.19                    | 0.78                | 15.82 |
| 2.03                  | 6.08       | 6.85              | 0.00                | 14.96       | 0.45                         | 10.80 | 10.35                    | 8.49                | 10.78 |
| 0.13                  | 2.32       | 3.40              | 4.91                | 10.76       | 0.28                         | 5.60  | 5.32                     | 3.65                | 5.33  |
| 0.00                  | 2.04       | 0.53              | 1.65                | 4.22        | 0.48                         | 3.75  | 3.27                     | 0.90                | 3.04  |
| 0.00                  | 3.20       | 0.65              | 1.45                | 5.30        | 0.00                         | 6.40  | 6.40                     | 4.01                | 5.44  |
| 2.00                  | 6.84       | 0.33              | 0.13                | <u>9.30</u> | 0.30                         | 7.12  | 6.82                     | 2.82                | 5.19  |
| 0.68                  | 2.80       | 2.64              | 1.22                | <u>7.34</u> | 0.48                         | 8.87  | 8.39                     | 7.64                | 8.39  |
| 0.77                  | 4.64       | 3.60              | 1.49                | 10.50       | 0.40                         | 6.75  | 6.35                     | 3.77                | 4.43  |

<sup>15</sup> Magnesium: Guaranteed, 1.2%; found, 1.54%.

<sup>16</sup> Magnesium: Guaranteed, 1.2%; found, 1.95%.

<sup>17</sup> Zinc: Guaranteed, .05%; found, .019%: Copper: Guaranteed, .05%; found, .047%: Manganese: Guaranteed, .136%; found, .078%: Magnesium: Guaranteed, .108%; found, .275%.

<sup>18</sup> Iron: Guaranteed, .15%; found, .71%.

TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No. | Manufacturer and brand                                     | Place of sampling |
|-------------|--|-------------------|
|             | <u>GODFREY'S GARDEN SHOPPE</u><br>Fairfield, Conn.         |                   |
| 1138        | Godfrey's Lawn & Tree Food 10-6-4                          | Fairfield         |
|             | <u>GOULARD &amp; OLENA, INC.</u><br>Skillman, N. J.        |                   |
| 960         | G & O Hyganic 10-6-4                                       | New Canaan        |
| 1147        | G & O Light Fantastic Lawn Food<br>20-6-4                  | Manchester        |
| 959         | G & O Prizegro 5-10-5                                      | New Canaan        |
| 962         | G & O Rhodo-Azalea-Camellia-Holly-<br>Blueberry 3-20-3     | New Canaan        |
| 963         | G & O Rose Food 7-8-5                                      | New Canaan        |
| 1139        | G & O Special Food for Bulbs 5-6-15                        | Fairfield         |
| 1140        | G & O Tomato Food 3-12-13                                  | Fairfield         |
|             | <u>HALSTEAD DISTRIBUTING CO.</u><br>Mt. Kisco, N. Y.       |                   |
| 748         | Just Right Lawns Gardens & Shrubs<br>5-10-5                | Darien            |
| 747         | Just Right Turf Food 10-6-4                                | Darien            |
|             | <u>THE CHARLES C. HART SEED CO.</u><br>Wethersfield, Conn. |                   |
| 917         | Hart's All Organic 5-4-0                                   | Wethersfield      |
| 918         | Hart's All Purpose Plant Food 5-10-5                       | Wethersfield      |
| 355         | Hart's Turf Food 20-10-5                                   | Cheshire          |
| 670         | Hart's Two-For-One 10-6-4                                  | Bloomfield        |
|             | <u>THE HUBBARD-HALL CHEMICAL CO.</u><br>Waterbury, Conn.   |                   |
| 872         | Green Gro Lawn Fertilizer 6-7-4                            | Bristol           |
| 546         | Green Ribbon Lawn Food 10-6-4                              | Bridgeport        |
| 547         | Green Ribbon Plant Food 5-10-5                             | Bridgeport        |
| 1017        | Gro-Fast Sol Water Soluble Concen-<br>trate 16-20-16       | Portland          |
| 749         | HH Evergreen Food 4-10-4                                   | Darien            |
| 871         | HH Lawn Fertilizer with Chlordane<br>8-6-4                 | Bristol           |

~~~~~ indicates deficiencies.



## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |              | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |             |
|-----------------------|------------|-------------------|---------------------|--------------|------------------------------|-------|--------------------------|---------------------|-------------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total        | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total       |
| 0.75                  | 4.64       | 3.44              | 1.45                | 10.28        | 0.30                         | 6.30  | 6.00                     | 4.25                | 4.75        |
| 0.45                  | 6.68       | 2.24              | 1.29                | 10.66        | 0.35                         | 7.22  | 6.87                     | 3.52                | 4.36        |
| 2.05                  | 1.88       | 6.70              | 8.19                | <u>18.82</u> | 0.25                         | 6.25  | 6.00                     | 1.94                | 4.52        |
| 0.90                  | 3.56       | 0.00              | 0.82                | <u>5.28</u>  | 0.58                         | 11.52 | 10.94                    | 4.10                | 5.22        |
| 0.51                  | 1.96       | 0.60              | 0.31                | 3.38         | 0.40                         | 20.85 | 20.45                    | 3.08                | 4.39        |
| 0.59                  | 4.92       | 0.52              | 1.47                | 7.50         | 0.35                         | 8.45  | 8.10                     | 4.22                | 5.38        |
| 0.53                  | 4.12       | 0.40              | 1.35                | 6.40         | 0.38                         | 6.40  | 6.02                     | 13.89               | 15.23       |
| 0.33                  | 2.16       | 0.04              | 0.93                | 3.46         | 0.90                         | 13.10 | 12.20                    | 9.52                | 13.13       |
| 0.59                  | 4.24       | 0.49              | 0.00                | 5.32         | 0.50                         | 10.50 | 10.00                    | 2.59                | 5.60        |
| 0.58                  | 5.48       | 2.72              | 2.22                | 11.00        | 0.33                         | 7.50  | 7.71                     | 2.22                | <u>2.81</u> |
| 0.00                  | 0.64       | 0.56              | 4.00                | 5.20         | 0.80                         | 7.80  | 7.00                     |                     |             |
| 0.91                  | 3.84       | 0.96              | 0.13                | 5.84         | 0.33                         | 10.60 | 10.27                    | 3.43                | <u>4.52</u> |
| 0.29                  | 2.88       | 14.17             | 1.50                | <u>18.84</u> | 0.68                         | 10.15 | <u>9.47</u>              | 4.78                | <u>6.99</u> |
| 0.61                  | 4.96       | 3.00              | 1.71                | 10.28        | 0.23                         | 7.45  | 7.22                     | 2.40                | 5.07        |
| 0.34                  | 3.64       | 1.40              | 0.76                | 6.14         | 0.50                         | 7.72  | 7.22                     | 3.49                | 4.49        |
| 0.81                  | 8.48       | 0.44              | 0.39                | 10.12        | 0.43                         | 7.32  | 6.89                     | 3.86                | 4.55        |
| 1.22                  | 3.44       | 0.60              | 0.18                | 5.44         | 0.53                         | 11.02 | 10.49                    | 4.38                | 5.31        |
| 2.54                  | 4.68       | 8.44              | 0.00                | <u>15.66</u> | 0.00                         | 19.15 | 19.15                    | 16.60               | 17.80       |
| 0.00                  | 2.12       | 0.89              | 1.09                | <u>4.10</u>  | 0.65                         | 12.05 | 11.40                    | 4.13                | 5.31        |
| 0.56                  | 3.28       | 3.76              | 1.08                | 8.68         | 0.68                         | 7.25  | 6.57                     | 3.13                | 4.05        |

TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No.          | Manufacturer and brand                      | Place of sampling |
|----------------------|---------------------------------------------|-------------------|
| 598                  | HH Nitroganic 5-4-0                         | Bridgeport        |
| 353                  | HH Plant Food 5-10-5                        | Cheshire          |
| 599                  | HH Rose Food 7-10-5                         | Bridgeport        |
| 597                  | HH Turf & Tree Food 10-6-4                  | Bridgeport        |
| 1008                 | HH Weed-Kil Lawn Food 6-10-4 with<br>2, 4D  | Portland          |
| 700 <sup>2</sup>     | Liberty Fertilizer 0-15-30                  | Newtown           |
| 1021                 | Liberty Fertilizer 0-15-30                  | Portland          |
| 1055                 | Liberty Fertilizer 0-20-20                  | Norwich           |
| 626 <sup>2,19</sup>  | Liberty Fertilizer 0-20-20 with Boron       | Mansfield Depot   |
| 1026 <sup>2,20</sup> | Liberty Fertilizer 0-20-20 with Boron       | Niantic           |
| 394                  | Liberty Fertilizer 5-8-7                    | North Haven       |
| 711                  | Liberty Fertilizer 5-8-7                    | Waterbury         |
| 393                  | Liberty Fertilizer 5-10-5                   | North Haven       |
| 1110 <sup>2</sup>    | Liberty Fertilizer 5-10-5                   | Storrs            |
| 496                  | Liberty Fertilizer 5-10-10                  | Kensington        |
| 627 <sup>2</sup>     | Liberty Fertilizer 5-10-10                  | Mansfield Depot   |
| 914 <sup>2</sup>     | Liberty Fertilizer 5-10-10                  | Meriden           |
| 1047 <sup>2</sup>    | Liberty Fertilizer 5-10-10                  | Niantic           |
| 1024 <sup>21</sup>   | Liberty Fertilizer 5-10-10-1.2<br>Magnesium | Portland          |
| 1073 <sup>22</sup>   | Liberty Fertilizer 5-10-10-1.2<br>Magnesium | Windsorville      |
| 1018                 | Liberty Fertilizer 5-15-30                  | Portland          |
| 912 <sup>2,23</sup>  | Liberty Fertilizer 6-8-8-1.2 Magnesium      | Cheshire          |
| 1075 <sup>24</sup>   | Liberty Fertilizer 6-8-8-1.2 Magnesium      | Windsorville      |
| 617 <sup>2</sup>     | Liberty Fertilizer 7-7-7                    | Storrs            |
| 654                  | Liberty Fertilizer 7-7-7                    | Danbury           |
| 891 <sup>2</sup>     | Liberty Fertilizer 7-7-7                    | Cheshire          |
| 1192 <sup>2</sup>    | Liberty Fertilizer 7-10-5                   | Newtown           |
| 361                  | Liberty Fertilizer 8-6-4                    | North Haven       |
| 1072 <sup>25</sup>   | Liberty Fertilizer 8-12-12-1.2<br>Magnesium | Windsorville      |
| 699 <sup>2</sup>     | Liberty Fertilizer 8-16-16                  | Newtown           |

~~~~~ indicates deficiencies.

<sup>2</sup> State purchase.

<sup>19</sup> Boron: Guaranteed, 0.11%; found, 0.17%.

<sup>20</sup> Boron: Guaranteed, 0.11%; found, 0.14%.

<sup>21</sup> Magnesium: Guaranteed, 1.2%; found, 2.55%.

## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |             | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |              |
|-----------------------|------------|-------------------|---------------------|-------------|------------------------------|-------|--------------------------|---------------------|--------------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total       | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total        |
| 0.00                  | 0.00       | 0.57              | 4.65                | 5.22        | 0.72                         | 7.47  | 6.75                     |                     |              |
| 2.27                  | 2.60       | 1.40              | 1.03                | 7.30        | 0.85                         | 11.62 | 10.77                    | 4.87                | 5.80         |
| 0.00                  | 3.92       | 2.60              | 1.20                | 7.72        | 0.18                         | 12.72 | 12.54                    | 0.27                | 5.66         |
| 0.46                  | 5.36       | 3.68              | 1.28                | 10.78       | 0.33                         | 6.87  | 6.54                     | 3.82                | 4.81         |
| 0.62                  | 5.36       | 0.20              | 0.64                | 6.82        | 0.43                         | 10.50 | 10.07                    | 3.55                | 4.27         |
|                       |            |                   |                     |             | 0.60                         | 15.10 | <u>14.50</u>             | 25.76               | 30.48        |
|                       |            |                   |                     |             | 0.40                         | 16.15 | <u>15.75</u>             | 25.27               | 31.08        |
|                       |            |                   |                     |             | 0.35                         | 19.05 | <u>18.70</u>             | 14.38               | 21.53        |
|                       |            |                   |                     |             | 0.78                         | 17.20 | <u>16.42</u>             | 15.36               | <u>18.60</u> |
|                       |            |                   |                     |             | 0.55                         | 21.15 | <u>20.60</u>             | 19.73               | <u>21.46</u> |
| 0.48                  | 3.68       | 0.64              | 0.30                | 5.10        | 0.45                         | 9.17  | 8.72                     | 7.13                | 7.33         |
| 0.70                  | 4.20       | 0.40              | 0.12                | 5.42        | 0.43                         | 8.90  | 8.47                     | 6.36                | 7.30         |
| 0.00                  | 4.08       | 0.94              | 0.30                | 5.32        | 0.45                         | 10.50 | 10.05                    | 4.70                | 5.41         |
| 0.60                  | 4.24       | 0.36              | 0.24                | 5.44        | 0.80                         | 11.52 | 10.72                    | 4.44                | 5.25         |
| 0.85                  | 3.68       | 0.68              | 0.11                | 5.32        | 0.53                         | 10.92 | 10.39                    | 7.70                | <u>9.69</u>  |
| 0.82                  | 3.96       | 0.64              | 0.00                | 5.42        | 0.70                         | 11.40 | 10.70                    | 6.91                | 10.19        |
| 0.67                  | 3.80       | 0.56              | 0.15                | 5.18        | 0.43                         | 10.90 | 10.47                    | 8.49                | <u>9.65</u>  |
| 0.77                  | 3.64       | 0.68              | 0.15                | 5.24        | 0.45                         | 10.90 | 10.45                    | 8.79                | <u>9.22</u>  |
| 0.76                  | 2.36       | 1.48              | 0.50                | 5.10        | 0.65                         | 10.75 | 10.10                    | 7.16                | 10.15        |
| 1.42                  | 3.16       | 0.28              | 0.00                | <u>4.86</u> | 0.58                         | 11.00 | 10.42                    | 6.81                | 11.16        |
| 0.30                  | 2.76       | 2.52              | 0.10                | <u>5.68</u> | 0.32                         | 11.15 | <u>10.83</u>             | 32.18               | 33.04        |
| 0.00                  | 3.24       | 2.62              | 0.26                | 6.12        | 0.33                         | 9.07  | 8.74                     | 7.80                | 9.18         |
| 1.20                  | 4.92       | 0.40              | 0.00                | 6.52        | 0.48                         | 10.52 | 10.04                    | 1.85                | 9.43         |
| 0.52                  | 6.24       | 0.48              | 0.00                | 7.24        | 0.25                         | 7.80  | 7.55                     | 5.83                | 7.47         |
| 0.66                  | 6.12       | 0.56              | 0.12                | 7.46        | 0.35                         | 7.72  | 7.37                     | 6.41                | 7.57         |
| 0.00                  | 2.88       | 3.99              | 0.21                | 7.08        | 0.25                         | 7.77  | 7.52                     | 5.75                | 7.23         |
| 0.22                  | 3.24       | 0.00              | 1.06                | 7.28        | 0.15                         | 9.70  | <u>9.55</u>              | 0.54                | 5.90         |
| 0.00                  | 4.36       | 2.79              | 0.75                | 7.90        | 0.40                         | 6.70  | 6.30                     | 5.15                | 5.94         |
| 1.06                  | 6.04       | 0.90              | 0.00                | 8.00        | 0.63                         | 12.85 | 12.22                    | 0.61                | 12.16        |
| 1.24                  | 5.68       | 0.36              | 0.10                | <u>7.38</u> | 0.55                         | 16.70 | 16.15                    | 15.42               | 17.90        |

<sup>22</sup> Magnesium: Guaranteed, 1.2%; found, 1.68%.

<sup>23</sup> Magnesium: Guaranteed, 1.2%; found, 2.24%.

<sup>24</sup> Magnesium: Guaranteed, 1.2%; found, 1.58%.

<sup>25</sup> Magnesium: Guaranteed, 1.2%; found, 1.71%.

TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No.           | Manufacturer and brand  | Place of sampling |
|-----------------------|---|-------------------|
| 732 <sup>2</sup>      | Liberty Fertilizer 8-16-16  | Southbury         |
| 650                   | Liberty Fertilizer 10-6-4   | New Milford       |
| 740 <sup>2</sup>      | Liberty Fertilizer 10-10-10   | Newtown           |
| 791 <sup>2</sup>      | Liberty Fertilizer 10-10-10   | Somers            |
| 1056                  | Liberty Fertilizer 10-10-10   | Norwich           |
| 1068 <sup>2, 26</sup> | Liberty Fertilizer 10-10-10 with Boron                                  | Middletown        |
| 1023                  | Liberty Fertilizer 15-10-10   | Portland          |
| 1019 <sup>27</sup>    | Liberty New Super Spud 8-10-10 with<br>1.2 Magnesium                    | Portland          |
| 1070                  | Liberty Super Corn 10-10-10 Fertilizer                                  | Windsorville      |
| 1020 <sup>28</sup>    | Liberty Super Gro 5-10-10-1.2<br>Magnesium                              | Portland          |
| 1071 <sup>29</sup>    | Liberty Super Gro 6-12-12-1.2<br>Magnesium                              | Windsorville      |
| 1077                  | Liberty Tobacco Fertilizer 6-3-6  | Windsorville      |
| 1121                  | Liberty Tobacco Fertilizer 6-3-6  | Wapping           |
| 362                   | Woodruff's 10-5-5 Lawn & Tree Food                                      | North Haven       |
|                       | <u>INTERNATIONAL MINERALS &amp;<br/>CHEMICAL CORP.</u><br>Woburn, Mass. |                   |
| 925                   | Vi Va Lawn Food 20-6-4  | Wethersfield      |
|                       | <u>LEBANON CHEMICAL CORP.</u><br>Lebanon, Pa.                           |                   |
| 736                   | Lebanon Azalea Food 7-7-7   | Hartford          |
| 735                   | Lebanon Fertilizer 5-10-10  | Hartford          |
| 923                   | Lebanon Fertilizer 10-10-10   | Wethersfield      |
| 920                   | Lebanon Rose Food 7-7-7   | Wethersfield      |
| 919                   | Lebanon Truck Crop 5-10-5   | Wethersfield      |
| 1085                  | Lebanon Turf Organic 5-4-0  | Hartford          |
| 1109                  | Lebanon Uniform 10-6-4  | West Hartford     |
|                       | <u>LEE PATTEN SEED CO.</u><br>Jersey City, N. J.                        |                   |
| 1053                  | Patco's Combo 10-6-4 with 2, 4-D plus<br>2, 4, 5-T                      | Norwich           |
| 1052                  | Patco's Featherweight (Lawn Food)<br>20-10-5                            | Norwich           |
| 491                   | Patco's Lawn Food 9-8-3   | Manchester        |

~~~~~ indicates deficiencies.

<sup>2</sup> State purchase.

<sup>26</sup> Boron: Guaranteed, 0.11%; found, 0.11%.



## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |              | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |              |
|-----------------------|------------|-------------------|---------------------|--------------|------------------------------|-------|--------------------------|---------------------|--------------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total        | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total        |
| 1.29                  | 5.60       | 0.53              | 0.00                | <u>7.42</u>  | 0.50                         | 16.90 | 16.40                    | 11.71               | 17.71        |
| 0.33                  | 7.52       | 1.92              | 0.89                | <u>10.66</u> | 0.40                         | 7.00  | 6.60                     | 3.39                | 4.62         |
| 0.89                  | 8.04       | 0.71              | 0.00                | <u>9.64</u>  | 0.38                         | 11.12 | 10.74                    | 9.87                | 10.73        |
| 1.06                  | 7.92       | 0.60              | 0.00                | <u>9.58</u>  | 0.33                         | 10.97 | 10.64                    | 7.53                | 10.55        |
| 1.06                  | 8.16       | 0.52              | 0.00                | <u>9.74</u>  | 0.35                         | 10.80 | 10.45                    | 9.03                | <u>9.69</u>  |
| 0.95                  | 8.00       | 0.71              | 0.00                | <u>9.66</u>  | 0.03                         | 10.75 | 10.72                    | 8.31                | <u>10.12</u> |
| 0.64                  | 10.60      | 5.76              | 0.00                | 17.00        | 0.07                         | 9.75  | <u>9.68</u>              | 5.78                | <u>8.45</u>  |
| 0.56                  | 6.00       | 0.92              | 0.24                | <u>7.72</u>  | 0.70                         | 11.25 | 10.55                    | 0.97                | 10.48        |
| 1.54                  | 8.00       | 0.46              | 0.00                | 10.00        | 0.40                         | 12.05 | 11.65                    | 8.11                | 10.12        |
| 0.69                  | 3.20       | 0.66              | 0.13                | <u>4.68</u>  | 0.63                         | 10.85 | 10.22                    | 6.65                | 10.26        |
| 0.63                  | 4.24       | 0.66              | 0.25                | <u>5.78</u>  | 0.50                         | 12.50 | 12.00                    | 9.22                | 12.81        |
| 1.31                  | 0.00       | 1.61              | 2.98                | <u>5.90</u>  | 0.15                         | 3.55  | 3.40                     | 0.24                | 6.28         |
| 1.25                  | 0.28       | 1.18              | 2.89                | <u>5.60</u>  | 0.33                         | 3.42  | 3.09                     | 0.16                | 6.11         |
| 0.00                  | 2.28       | 5.58              | 1.12                | <u>8.98</u>  | 0.45                         | 7.20  | 6.75                     | 5.22                | 5.94         |
| 0.78                  | 4.84       | 13.24             | 1.14                | 20.00        | 0.52                         | 6.40  | 5.88                     | 1.53                | 4.46         |
| 0.68                  | 4.88       | 0.60              | 1.30                | 7.46         | 0.38                         | 7.48  | 7.10                     | 6.81                | 7.61         |
| 0.00                  | 4.28       | 1.49              | 0.17                | 5.94         | 0.07                         | 9.84  | <u>9.77</u>              | 10.68               | 11.20        |
| 0.84                  | 7.56       | 0.88              | 0.00                | <u>9.28</u>  | 0.10                         | 11.85 | 11.75                    | 7.30                | <u>9.36</u>  |
| 0.43                  | 5.12       | 0.76              | 1.11                | <u>7.42</u>  | 0.15                         | 7.68  | 7.53                     | 6.00                | <u>7.68</u>  |
| 0.98                  | 3.68       | 0.60              | 0.12                | 5.38         | 0.23                         | 10.57 | 10.34                    | 2.48                | 5.17         |
| 0.10                  | 0.20       | 0.60              | 4.32                | 5.22         | 0.85                         | 6.35  | 5.50                     |                     |              |
| 0.34                  | 2.04       | 2.90              | 3.94                | <u>9.22</u>  | 0.60                         | 7.62  | 7.02                     | 4.62                | 5.07         |
| 1.02                  | 4.48       | 2.00              | 3.22                | 10.72        | 0.30                         | 7.47  | 7.17                     | 3.45                | 5.00         |
| 0.50                  | 2.60       | 14.32             | 1.76                | <u>19.18</u> | 0.45                         | 10.90 | 10.45                    | 3.88                | 6.07         |
| 0.77                  | 5.16       | 1.35              | 1.60                | <u>8.88</u>  | 0.37                         | 8.72  | 8.35                     | 2.62                | 3.32         |

<sup>27</sup> Magnesium: Guaranteed, 1.20%; found, 1.20%.

<sup>28</sup> Magnesium: Guaranteed, 1.20%; found, 2.30%.

<sup>29</sup> Magnesium: Guaranteed, 1.20%; found, 1.23%.

TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No.        | Manufacturer and brand                                          | Place of sampling |
|--------------------|-----------------------------------------------------------------|-------------------|
|                    | <u>THE MAMLON CO.</u><br>New Haven, Conn.                       |                   |
| 1011               | Fer-Mel General Purpose Plant Food<br>18-18-18                  | Portland          |
| 1016               | Fer-Mel Turf & Tree Food 24-12-12                               | Portland          |
|                    | <u>McARDLE'S SEED CO.</u><br>Greenwich, Conn.                   |                   |
| 408                | McArdle's 10-6-4                                                | Greenwich         |
|                    | <u>OLD FOX AGRICULTURAL SALES CO.</u><br>East Providence, R. I. |                   |
| 794                | Green Lawn Fertilizer 8-6-4                                     | Hazardville       |
| 797                | Old Fox Brand 4-16-20                                           | Hazardville       |
| 799                | Old Fox Brand 5-8-7                                             | Hazardville       |
| 792 <sup>30</sup>  | Old Fox Brand 5-10-10-1.2 Magnesium                             | Hazardville       |
| 1004 <sup>31</sup> | Old Fox Brand 5-10-10-1.2 Magnesium                             | Wapping           |
| 1132               | Old Fox Brand 6-3-6                                             | Hazardville       |
| 1003 <sup>32</sup> | Old Fox Brand 6-8-8-1.2 Magnesium                               | South Windsor     |
| 798 <sup>33</sup>  | Old Fox Brand 6-10-10-1.2 Magnesium                             | Hazardville       |
| 1005               | Old Fox Brand 7-7-7                                             | Wapping           |
| 1125 <sup>34</sup> | Old Fox Brand 8-10-10-1.2 Magnesium                             | Hazardville       |
| 1137 <sup>35</sup> | Old Fox Brand 8-12-12-1.2 Magnesium                             | Hazardville       |
| 1128               | Old Fox Brand 8-16-16                                           | Hazardville       |
| 830 <sup>2</sup>   | Old Fox Brand 10-10-10                                          | Willimantic       |
| 1126               | Old Fox Brand 10-10-10                                          | Hazardville       |
| 828                | Old Fox Garden Food 5-10-5                                      | Willimantic       |
| 1131               | Old Fox No Pest Turf Food 8-6-2                                 | Hazardville       |
| 802                | Old Fox Organo 5-0-0                                            | Willimantic       |
| 1090 <sup>36</sup> | Old Fox Tobacco Fertilizer 6-3-6-1.2<br>Magnesium               | Wapping           |
| 1130 <sup>37</sup> | Old Fox Tobacco Fertilizer 6-3-6-1.2<br>Magnesium               | Hazardville       |
| 801                | Old Fox Turf Food 8-6-2                                         | Willimantic       |
| 795                | Old Fox Turf Food 10-6-4 with<br>Ureaform                       | Hazardville       |

~~~~~ indicates deficiencies.

<sup>2</sup> State purchase.

<sup>30</sup> Magnesium: Guaranteed, 1.20%; found, 2.32%.

<sup>31</sup> Magnesium: Guaranteed, 1.20%; found, 1.21%.

<sup>32</sup> Magnesium: Guaranteed, 1.20%; found, 2.53%.

## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |       | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|-------|------------------------------|-------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total |
| 3.92                  | 4.16       | 10.24             | 0.00                | 18.32 | 0.08                         | 19.90 | 19.82                    | 19.72               | 20.20 |
| 3.56                  | 3.28       | 18.16             | 0.00                | 25.00 | 0.15                         | 14.17 | 14.02                    | 10.46               | 12.43 |
| 0.00                  | 5.16       | 4.78              | 0.78                | 10.72 | 0.20                         | 7.35  | 7.15                     | 4.29                | 5.80  |
| 0.31                  | 7.12       | 0.59              | 0.00                | 8.02  | 0.10                         | 6.87  | 6.77                     | 1.78                | 4.24  |
| 0.53                  | 3.08       | 0.39              | 0.00                | 4.00  | 0.58                         | 15.75 | 15.17                    | 18.21               | 19.57 |
| 0.83                  | 4.64       | 0.17              | 0.00                | 5.64  | 0.15                         | 9.47  | 9.32                     | 6.60                | 8.49  |
| 1.03                  | 3.20       | 0.79              | 0.00                | 5.02  | 0.28                         | 10.92 | 10.64                    | 8.03                | 11.35 |
| 0.64                  | 4.12       | 0.24              | 0.00                | 5.00  | 0.13                         | 11.37 | 11.24                    |                     | 10.59 |
| 0.13                  | 1.08       | 2.44              | 2.37                | 6.02  | 0.10                         | 3.17  | 3.07                     | 0.35                | 7.37  |
| 0.59                  | 5.44       | 0.24              | 0.11                | 6.38  | 0.20                         | 10.05 | 9.85                     | 4.50                | 8.42  |
| 1.11                  | 3.68       | 0.79              | 0.30                | 5.88  | 0.20                         | 10.97 | 10.77                    | 8.42                | 10.78 |
| 0.61                  | 5.24       | 0.63              | 0.00                | 6.48  | 0.10                         | 8.52  | 8.42                     | 5.78                | 8.15  |
| 0.38                  | 6.00       | 0.80              | 0.62                | 7.80  | 0.00                         | 10.75 | 10.75                    | 4.89                | 10.37 |
| 0.88                  | 5.32       | 0.28              | 0.36                | 6.84  | 0.10                         | 11.80 | 11.70                    | 8.15                | 10.04 |
| 0.81                  | 4.12       | 0.53              | 0.00                | 5.46  | 0.80                         | 24.45 | 23.65                    | 7.66                | 9.61  |
| 2.00                  | 7.26       | 0.03              | 0.17                | 9.46  | 0.20                         | 11.00 | 10.80                    | 9.46                | 10.78 |
| 1.96                  | 7.04       | 0.06              | 0.00                | 9.06  | 0.20                         | 10.30 | 10.10                    | 9.93                | 11.70 |
| 9.90                  | 3.40       | 0.60              | 0.10                | 5.00  | 0.68                         | 11.82 | 11.14                    | 4.69                | 8.25  |
| 0.44                  | 4.48       | 2.44              | 0.54                | 7.90  | 0.48                         | 7.80  | 7.32                     | 2.90                | 3.13  |
| 0.00                  | 0.00       | 0.36              | 4.28                | 4.64  |                              |       |                          |                     |       |
| 0.32                  | 0.96       | 1.96              | 2.92                | 6.16  | 0.10                         | 3.95  | 3.85                     | 0.33                | 6.18  |
| 0.00                  | 0.92       | 1.94              | 2.72                | 5.58  | 0.07                         | 3.60  | 3.53                     | 0.28                | 7.13  |
| 0.45                  | 4.60       | 1.64              | 1.47                | 8.16  | 0.45                         | 6.87  | 6.42                     | 1.99                | 2.69  |
| 0.83                  | 2.24       | 2.36              | 5.43                | 10.86 | 0.20                         | 6.97  | 6.77                     | 4.22                | 4.97  |

<sup>33</sup> Magnesium: Guaranteed, 1.20%; found, 2.15%.

<sup>34</sup> Magnesium: Guaranteed, 1.20%; found, 1.90%.

<sup>35</sup> Magnesium: Guaranteed, 1.20%; found, 1.54%.

<sup>36</sup> Magnesium: Guaranteed, 1.20%; found, 3.30%.

<sup>37</sup> Magnesium: Guaranteed, 1.20%; found, 3.19%.



TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No.        | Manufacturer and brand   | Place of sampling |
|--------------------|--|-------------------|
| 1143 <sup>38</sup> | <u>PLANT PRODUCTS CORP.</u><br>Long Island, N. Y.<br>Plant Prod Sequestered Soluble<br>Fertilizer 15-30-15 | Milford           |
| 958                | <u>FRANK S. PLATT CO.</u><br>Branford, Conn.<br>Platt's Hi-Organic Lawn Fertilizer<br>10-5-5               | West Haven        |
| 390                | <u>O. M. SCOTT &amp; SONS CO.</u><br>Marysville, Ohio<br>Scott's New Turf Builder 20-10-5                  | New Haven         |
| 1051               | <u>SEABOARD SEED CO.</u><br>Philadelphia, Pa.<br>Seaboard's Complete Lawn & Plant<br>Food 20-10-5          | Norwich           |
| 1048               | <u>SEARS, ROEBUCK &amp; CO.</u><br>Chicago, Ill.<br>Cross Country Lawn Food 5-5-0                          | New London        |
| 629                | Cross Country Lawn Food 5-5-0 with<br>Crabgrass Killer   | Manchester        |
| 358                | Cross Country Lawn Food 5-5-0 with<br>Weed Killer  | Hamden            |
| 1022               | Cross Country Lawn Quick Green<br>10-6-4   | Portland          |
| 1009               | Cross Country Merion Bluegrass<br>Lawn Food 20-10-5  | Portland          |
| 359                | Cross Country Plant Food 5-10-5  | Hamden            |
| 873                | <u>M. L. SHOEMAKER DIV.</u><br>Philadelphia, Pa.<br>M. L. Shoemaker's "Swift-Sure"<br>4-10-0               | West Suffield     |

~~~~~ indicates deficiencies.

<sup>38</sup> Manganese: Guaranteed, 0.099%; found, 0.084%: Iron: Guaranteed, 0.060%; found, 0.069%: Copper: Guaranteed, 0.032%; found, 0.034%: Zinc: Guaranteed, 0.031%; found,



## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |             | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|-------------|------------------------------|-------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total       | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total |
| 0.00                  | 13.20      | 3.38              | 0.00                | 16.58       | 0.08                         | 35.25 | 35.17                    | 14.98               | 16.68 |
| 0.67                  | 6.08       | 2.20              | 1.09                | 10.04       | 0.33                         | 5.72  | 5.39                     | 4.86                | 5.63  |
| 0.44                  | 1.40       | 11.76             | 6.44                | 20.04       | 0.63                         | 10.67 | 10.04                    | 3.80                | 5.22  |
| 0.19                  | 1.86       | 15.58             | 2.37                | 20.00       | 0.62                         | 10.62 | 10.00                    | 4.06                | 4.97  |
| 0.00                  | 0.24       | 0.35              | 4.41                | 5.00        | 0.88                         | 6.52  | 5.64                     |                     |       |
| 0.00                  | 0.00       | 0.98              | 4.54                | 5.52        | 0.77                         | 7.80  | 7.03                     |                     |       |
| 0.00                  | 0.00       | 0.37              | 4.51                | <u>4.88</u> | 0.88                         | 5.55  | <u>4.67</u>              |                     |       |
| 0.16                  | 6.36       | 2.44              | 0.42                | <u>9.38</u> | 0.50                         | 7.65  | 7.15                     | 4.13                | 4.27  |
| 0.00                  | 2.92       | 12.06             | 5.08                | 20.06       | 0.80                         | 10.90 | 10.10                    | 2.74                | 5.25  |
| 0.97                  | 3.32       | 0.60              | 0.11                | 5.00        | 0.30                         | 10.55 | 10.25                    | 3.24                | 5.60  |
| 0.72                  | 2.56       | 0.36              | 0.50                | 4.14        | 0.58                         | 11.37 | 10.79                    |                     |       |

0.021%: Boron: Guaranteed, 0.021%; found, 0.058%:

Molybdenum: Guaranteed, 0.006%; found, 0.005%.

TABLE 5. ANALYSES OF MIXED FERTILIZERS

| Station No. | Manufacturer and brand                                  | Place of sampling |
|-------------|---------------------------------------------------------|-------------------|
|             | <u>STERLING FOREST PEAT CO. INC.</u><br>New York, N. Y. |                   |
| 668         | Sterling Forest Soil 0.25-0.014-0.006                   | Hartford          |
|             | <u>SWIFT &amp; CO.</u><br>Baltimore, Md.                |                   |
| 653         | Golden Vigoro 12-5-7                                    | Danbury           |
| 403         | Pink Vigoro 8-12-6                                      | Wallingford       |
| 864         | Vigoro Lawn Starter 10-20-10                            | Bristol           |
| 715         | Vitogro 16-8-4                                          | Stamford          |
|             | <u>L. TEWELES SEED CO.</u><br>Milwaukee, Wis.           |                   |
| 784         | Nuturf Turf-Life 18-8-5                                 | Thompsonville     |
|             | <u>UNIVERSAL CHEMICAL CO. INC.</u><br>West Lynn, Mass.  |                   |
| 1012        | Electra Plant Food 5-10-3                               | Portland          |
|             | <u>OSCAR F. WARNER</u><br>Waterbury, Conn.              |                   |
| 713         | Warner Grubedizer 8-6-4                                 | Waterbury         |
| 712         | Warner Lawn Food 8-6-4                                  | Waterbury         |
| 714         | Warner Tree Food 12-6-4                                 | Waterbury         |
|             | <u>WHITNEY SEED CO. INC.</u><br>Buffalo, N. Y.          |                   |
| 1111        | Vital Brand Fertilizer plus Weed<br>Killer 5-4-2        | Willimantic       |
| 733         | Vital Brand Lawn Fertilizer 20-10-5                     | New Milford       |
| 1112        | Vital Brand Lawn Fertilizer 10-6-4                      | Willimantic       |
|             | <u>GARFIELD WILLIAMSON, INC.</u><br>Jersey City, N. J.  |                   |
| 501         | Wonderlawn Lawn Food 10-6-4                             | Bridgeport        |
|             | <u>S. D. WOODRUFF &amp; SONS</u><br>Wethersfield, Conn. |                   |
| 921         | Woodruff's Tuf Turf Lawn 20-10-5                        | Wethersfield      |
| 916         | Woodruff's Tuf Turf Turf Food 10-6-4                    | Wethersfield      |
| 922         | Woodruff's Tuf Turf Two-For-One<br>10-6-4               | Wethersfield      |

~~~~ indicates deficiencies.

## CONTAINING NITROGEN, PHOSPHORIC ACID, AND POTASH

| Nitrogen,<br>per cent |            |                   |                     |              | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|--------------|------------------------------|-------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total        | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total |
|                       |            |                   |                     | 0.25         | 0.23                         | 0.48  | 0.25                     |                     | 0.22  |
| 0.22                  | 1.24       | 7.86              | 3.76                | 13.08        | 0.40                         | 6.50  | 6.10                     | 0.40                | 8.93  |
| 0.27                  | 5.40       | 2.92              | 0.25                | 8.84         | 0.05                         | 12.97 | 12.92                    | 5.86                | 6.45  |
| 1.11                  | 6.44       | 1.44              | 0.17                | <u>9.16</u>  | 0.80                         | 21.90 | 21.10                    | 5.37                | 10.44 |
| 0.49                  | 1.32       | 10.80             | 3.27                | <u>15.88</u> | 0.50                         | 9.60  | 9.10                     | 0.44                | 5.31  |
| 0.57                  | 2.64       | 10.60             | 1.73                | <u>15.54</u> | 0.52                         | 10.35 | 9.83                     | 6.68                | 8.39  |
| 0.47                  | 2.04       | 0.52              | 2.13                | 5.16         | 0.50                         | 10.50 | 10.00                    | 3.01                | 3.67  |
| 0.00                  | 1.72       | 5.60              | 1.36                | 8.68         | 0.75                         | 9.00  | 8.25                     | 4.17                | 4.81  |
| 0.53                  | 4.20       | 2.56              | 1.21                | 8.50         | 0.58                         | 8.50  | 7.92                     | 4.82                | 6.18  |
| 0.38                  | 3.96       | 6.64              | 1.20                | 12.18        | 0.60                         | 7.95  | 7.35                     | 5.09                | 6.75  |
| 0.00                  | 0.00       | 0.49              | 5.11                | 5.60         | 0.55                         | 6.32  | 5.77                     | 1.95                | 2.59  |
| 0.00                  | 2.60       | 13.24             | 3.04                | <u>18.88</u> | 0.70                         | 11.42 | 10.72                    | 3.64                | 5.45  |
| 0.00                  | 0.28       | 7.53              | 2.93                | <u>10.74</u> | 0.30                         | 6.80  | 6.50                     | 3.85                | 4.81  |
| 0.24                  | 5.84       | 2.60              | 1.70                | 10.38        | 0.38                         | 6.80  | 6.42                     | 4.89                | 5.60  |
| 0.91                  | 2.64       | 13.20             | 2.05                | <u>18.80</u> | 0.70                         | 10.60 | 9.90                     | 2.67                | 5.54  |
| 0.44                  | 4.88       | 2.00              | 1.14                | <u>8.46</u>  | 0.28                         | 7.60  | 7.32                     | 5.15                | 6.75  |
| 0.41                  | 4.52       | 4.32              | 1.33                | 10.58        | 0.55                         | 6.77  | 6.22                     | 1.42                | 4.52  |

TABLE 6. ANALYSES OF SHEEP MANURE, ETC.

| Station No. | Manufacturer, brand and dealer   |
|-------------|--|
| 578         | Pulverized Sheep Manure. American Agricultural Chemical Co., No. Weymouth, Mass. Sampled at McArdle's Seed Co., Greenwich.             |
| 850         | Armour Cattle Manure. Armour Agricultural Chemical Co., Carteret, N. J. Sampled at Thompsonville Garden Center-Nursery, Thompsonville. |
| 993         | Armour Sheep Manure & Inert Matter. Armour Agricultural Chemical Co., Carteret, N. J. Sampled at Armour Fertilizer Works, So. Windsor. |
| 756         | Corenco Sheep Manure & Inert Matter. Consolidated Rendering Co., Boston, Mass. Sampled at Libner Grain Co. Inc., Norwalk.              |
| 471         | Davey Shredded Manure. The Davey Tree Expert Co., Kent, Ohio. Sampled at The Davey Tree Expert Co., Old Greenwich.                     |
| 672         | G & O Cattle Manure. Goulard & Olen, Inc., Skillman, N. J. Sampled at The Peter Cascio Nursery, West Hartford.                         |
| 870         | HH Cow Manure & Inert Matter. The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at Bristol Nurseries, Inc., Bristol.             |
| 1010        | HH Sheep Manure & Inert Matter. The Hubbard-Hall Chemical Co., Waterbury, Conn. Sampled at The Hubbard-Hall Chemical Co., Portland.    |
| 737         | Fertal-Gro Cow Manure. Maegeo Dehydrating Co., Lexington, N. C. Sampled at The Garden Mart Inc., Bloomfield.                           |
| 734         | Sheep Manure. Maegeo Dehydrating Co., Lexington, N. C. Sampled at Cadwell & Jones, Inc., Hartford.                                     |
| 776         | Longhorn Brand Cattle Manure. Natural Plant Food Co., Oklahoma City, Okla. Sampled at Adams-Brainard, Inc., Thompsonville.             |
| 777         | Ramshorn Brand Sheep Manure. Natural Plant Food Co., Oklahoma City, Okla. Sampled at Adams-Brainard, Inc., Thompsonville.              |
| 608         | Cow-O Plant Food. Nebraska Fertilizer Co., Omaha, Neb. Sampled at King's Department Stores, Inc., Milford.                             |
| 357         | Cross Country Cattle Manure. Sears, Roebuck & Co., Chicago, Ill. Sampled at Sears, Roebuck & Co., Hamden.                              |



TABLE 6. ANALYSES OF SHEEP MANURE, ETC.

| Nitrogen,<br>per cent |             |                  | Phosphoric acid,<br>per cent |             |                  |                             | Potash,<br>per cent |                  | Sand, per cent |
|-----------------------|-------------|------------------|------------------------------|-------------|------------------|-----------------------------|---------------------|------------------|----------------|
| Ammoniacal            | Total found | Total guaranteed | Citrate-insoluble            | Total found | Total guaranteed | So-called "available" found | Total found         | Total guaranteed |                |
| 0.00                  | 1.32        | 1.25             |                              | 1.15        | 1.00             |                             | 3.73                | 2.00             | 29.93          |
| 0.00                  | 2.00        | 2.00             |                              | 1.25        | 1.00             |                             | 2.59                | 2.00             | 24.57          |
| 0.00                  | 1.25        | 1.25             | 0.40                         | 1.55        | 1.00             | 1.15                        | 3.86                | 2.00             | 39.57          |
| 0.00                  | 1.56        | 1.25             |                              | 3.47        | 1.00             |                             | 3.38                | 2.00             | 27.17          |
| 0.00                  | 3.24        | 2.00             | 0.75                         | 3.70        |                  | 2.95 <sup>1</sup>           | 2.72                | 1.00             | 0.41           |
| 0.00                  | 1.04        | 1.00             |                              | 1.20        | 1.00             |                             | 1.67                | 1.00             | 61.83          |
| 0.00                  | <u>1.20</u> | 1.50             |                              | 1.10        | 1.00             |                             | 1.51                | 1.00             | 50.43          |
| 0.00                  | 1.20        | 1.25             | 0.33                         | 1.30        |                  | 0.97 <sup>1</sup>           | 1.90                | 1.00             | 44.74          |
| 0.00                  | <u>1.28</u> | 2.00             | 0.20                         | 0.70        |                  | <u>0.50<sup>1</sup></u>     | <u>6.38</u>         | 7.00             | 27.38          |
| 0.00                  | <u>1.38</u> | 2.00             | 0.07                         | 1.20        |                  | 1.13 <sup>1</sup>           | 6.79                | 5.00             | 9.59           |
| 0.00                  | 2.00        | 2.00             |                              | 1.30        | 1.00             |                             | 2.56                | 2.00             | 16.69          |
| 0.00                  | 2.00        | 2.00             |                              | 1.40        | 1.00             |                             | 2.46                | 2.00             | 20.63          |
| 0.00                  | 1.50        | 1.50             |                              | 1.80        | 1.00             |                             | 2.85                | 2.00             | 27.50          |
| 0.00                  | 1.96        | 1.50             | 0.25                         | 1.25        |                  | 1.00 <sup>1</sup>           | 2.43                | 2.00             | 22.50          |

TABLE 6. ANALYSES OF SHEEP MANURE, ETC.

| Station No. | Manufacturer, brand and dealer  |
|-------------|---|
| 628         | Cross Country Sheep Manure. Sears, Roebuck & Co., Chicago, Ill. Sampled at Sears, Roebuck & Co., Manchester.                                  |
| 926         | Wizard Pulverized Cow Manure. St. Louis National Stock-yards Co., National Stock Yards, Ill. Sampled at Comstock Ferre & Co., Wethersfield.   |
| 927         | Wizard Pulverized Sheep Manure. St. Louis National Stock-yards Co., National Stock Yards, Ill. Sampled at Comstock Ferre & Co., Wethersfield. |
| 652         | Bovung. Walker-Gordon Laboratory Co., Plainsboro, N.J. Sampled at Meeker Hardware, Danbury.   |

~~~~ indicates deficiencies.

<sup>1</sup> Guaranteed, 1.0%.

TABLE 6. ANALYSES OF SHEEP MANURE, ETC.

| Nitrogen,<br>per cent |             |                  | Phosphoric acid,<br>per cent |             |                  |                             | Potash,<br>per cent |                  | Sand, per cent |
|-----------------------|-------------|------------------|------------------------------|-------------|------------------|-----------------------------|---------------------|------------------|----------------|
| Ammoniacal            | Total found | Total guaranteed | Citrate-insoluble            | Total found | Total guaranteed | So-called "available" found | Total found         | Total guaranteed |                |
| 0.00                  | 2.32        | 1.50             | 0.32                         | 1.60        |                  | 1.28 <sup>1</sup>           | 3.32                | 2.00             | 10.54          |
| 0.00                  | 1.96        | 2.00             | 0.33                         | 2.62        |                  | 2.29 <sup>1</sup>           | 1.96                | 2.00             | 30.18          |
| 0.00                  | 2.00        | 2.00             | 0.40                         | 1.87        |                  | 1.47 <sup>1</sup>           | 2.97                | 2.00             | 15.00          |
| 0.00                  | 2.00        | 2.00             | 0.30                         | 1.47        |                  | 1.17 <sup>1</sup>           | 3.13                | 2.00             | 1.17           |

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Station No.             | Manufacturer and brand                                         | Place of sampling        |
|-------------------------|----------------------------------------------------------------|--------------------------|
|                         | <u>AGRICULTURAL PRODUCTS CO.</u><br>Providence, R. I.          |                          |
| 849<br>609 <sup>1</sup> | Apco All Purpose Plant Food 5-10-5<br>Apco Bone Meal 2.25-20-0 | Thompsonville<br>Milford |
|                         | <u>AMERICAN AGRICULTURAL CHEMICAL CO.,</u> No. Weymouth, Mass. |                          |
| 1054                    | Agrico for Azaleas, Camellias & Rhododendrons 6-10-4           | Norwich                  |
| 544                     | Agrico Rose Food 5-9-6                                         | Bridgeport               |
| 718                     | Agrico Water Soluble Plant Food 17-17-17                       | Stamford                 |
|                         | <u>ARMOUR AGRICULTURAL CHEMICAL CO.,</u> Carteret, N. J.       |                          |
| 868 <sup>2</sup>        | Armour Bone Meal 2.3-23-0                                      | Bristol                  |
| 869                     | Armour Vertagreen Rose Food 5-10-5                             | Bristol                  |
|                         | <u>ATLAS FISH FERTILIZER CO.</u><br>San Francisco, Calif.      |                          |
| 591                     | Atlas Fish Emulsion Fertilizer 5-1-1                           | Hamden                   |
|                         | <u>CALIFORNIA SPRAY-CHEMICAL CORP.</u><br>Richmond, Calif.     |                          |
| 392                     | Ortho-Gro Liquid Plant Food 15-5-5                             | New Haven                |
| 743                     | Ortho Liquid Rose Food 8-12-4                                  | Stamford                 |
|                         | <u>THE PETER CASCIO NURSERY</u><br>West Hartford, Conn.        |                          |
| 694 <sup>3</sup>        | Cattle Manure                                                  | West Hartford            |
| 695                     | Horn & Hoof Meal                                               | West Hartford            |
|                         | <u>CLINTON NURSERIES</u><br>Clinton, Conn.                     |                          |
| 386                     | New Era African Violet Food 6-18-6                             | Southington              |
| 332                     | New Era Gro Plant Food Tablets<br>10-29-18                     | Southington              |
| 1190                    | New Era Gro Plant Food Tablets<br>10-29-18                     | Clinton                  |
| 455                     | New Era Liquid Plant Food 8-12-8                               | Greenwich                |

~~~~ indicates deficiencies.

<sup>1</sup> Mechanical analysis: Fine, 52.0%; coarse, 48.0%.



TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Nitrogen,<br>per cent |            |                   |                     |               | Phosphoric acid,<br>per cent |                |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|---------------|------------------------------|----------------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total         | Citrate-<br>insoluble        | Total          | So-called<br>"available" | As<br>muriate       | Total |
| 0.00                  | 4.92       | 0.17              | 0.41                | 5.50<br>2.54  | 0.58<br>7.65                 | 11.22<br>27.85 | 10.64<br>20.20           | 2.66                | 5.94  |
| 0.32                  | 4.72       | 0.48              | 0.70                | 6.22          | 0.68                         | 11.37          | 10.69                    | 3.90                | 4.05  |
| 0.61                  | 1.88       | 0.60              | 1.91                | 5.00          | 0.45                         | 9.97           | 9.52                     | 7.25                | 7.91  |
| 3.36                  | 3.80       | 10.48             | 0.00                | 17.64         | 0.08                         | 19.70          | 19.62                    |                     | 17.30 |
|                       |            |                   |                     | 2.58          |                              | 26.70          |                          |                     |       |
| 0.54                  | 3.84       | 0.16              | 0.80                | 5.34          | 1.05                         | 11.82          | 10.77                    | 4.49                | 5.66  |
| 0.52                  | 0.52       | 3.90              | 0.50                | 5.44          | 0.08                         | 1.10           | 1.02                     | 1.80                | 1.80  |
| 0.00                  | 0.80       | 14.50             | 0.00                | 15.30         | 0.00                         | 5.05           | 5.05                     |                     | 5.54  |
| 0.00                  | 1.96       | 4.96              | 0.00                | <u>6.92</u>   | 0.00                         | 12.12          | 12.12                    |                     | 4.36  |
|                       |            |                   |                     | 1.24<br>14.30 |                              | 0.87           |                          |                     | 1.96  |
| 0.00                  | 6.48       | 0.28              | 0.00                | 6.76          | 0.00                         | 19.95          | 19.95                    | 3.11                | 6.55  |
| 0.00                  | 5.88       | 5.00              | 0.00                | 10.88         | 0.13                         | 29.45          | 29.32                    | 15.46               | 18.48 |
| 0.00                  | 6.28       | 4.37              | 0.05                | 10.70         | 0.43                         | 30.55          | 30.12                    | 13.97               | 18.10 |
| 0.00                  | 4.08       | 4.50              | 0.00                | 8.58          | 0.00                         | 13.07          | 13.07                    | 7.49                | 8.59  |

<sup>2</sup> Mechanical analysis: Fine, 49.0%; coarse, 51.0%.  
<sup>3</sup> Sand, 53.70%.

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Station No.      | Manufacturer and brand  | Place of sampling |
|------------------|---|-------------------|
|                  | <u>CONSOLIDATED RENDERING CO.</u><br>Boston, Mass.                          |                   |
| 853 <sup>4</sup> | Corenco Ground Bone 2-22-0  | Thompsonville     |
| 852              | Corenco Home Garden 5-10-5  | Thompsonville     |
|                  | <u>DAYTON FERTILIZER CORP.</u><br>Dayton, N. J.                             |                   |
| 631              | Grand Garden Rose Food 6-8-6  | Manchester        |
|                  | <u>EASTERN STATES FARMERS'</u><br>EXCHANGE, INC.<br>West Springfield, Mass. |                   |
| 479              | Eastern States Start-N-Gro 16-32-16   | Yantic            |
|                  | <u>EDGEWOOD FARMS, INC.</u><br>Marysville, Ohio                             |                   |
| 1103             | Edgewood Farms Rose Food 18-9-5   | New London        |
|                  | <u>THE ESPOMA CO.</u><br>Millville, N. J.                                   |                   |
| 989              | Bulb Tone 4-10-6  | Ridgefield        |
| 1107             | Espoma Rose Food 6-6-4  | West Hartford     |
|                  | <u>EXCELL LABORATORIES INC.</u><br>Chicago, Ill.                            |                   |
| 787              | New Plant Life  | Thompsonville     |
|                  | <u>FAESY &amp; BESTHOFF, INC.</u><br>New York, N. Y.                        |                   |
| 782              | F & B Azalea, Camellia & Rhododen-<br>dron Food 5-10-10                     | Thompsonville     |
| 783              | F & B Rose Food 8-10-4  | Thompsonville     |
| 990              | F & B Sulphate of Ammonia 20.5%   | Ridgefield        |
|                  | <u>GOULARD &amp; OLENA, INC.</u><br>Skillman, N. J.                         |                   |
| 696              | G & O Evergreen Tree & Shrub Food<br>9-7-4                                  | West Hartford     |
| 988              | G & O Rhodo-Azalea-Camellia-Holly<br>Blueberry Food 3-20-3                  | New Canaan        |

~~~~~ indicates deficiencies.

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Nitrogen,<br>per cent |            |                   |                     |              | Phosphoric acid,<br>per cent |                |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|--------------|------------------------------|----------------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total        | Citrate-<br>insoluble        | Total          | So-called<br>"available" | As muriate          | Total |
| 0.71                  | 4.16       | 0.77              | 0.00                | 2.26<br>5.64 | 0.28                         | 27.85<br>10.85 | 10.57                    | 3.27                | 5.94  |
| 0.40                  | 4.00       | 0.80              | 1.06                | 6.26         | 0.33                         | 8.62           | 8.29                     | 5.95                | 6.52  |
| 5.26                  | 8.00       | 2.88              | 0.00                | 16.14        | 0.08                         | 32.30          | 32.22                    |                     | 16.92 |
| 0.00                  | 1.24       | 13.33             | 6.13                | 20.70        | 0.95                         | 10.20          | 9.25                     | 3.61                | 5.03  |
| 0.00                  | 2.80       | 0.30              | 0.22                | 3.32         | 0.55                         | 11.82          | 11.27                    | 6.20                | 7.47  |
| 0.23                  | 5.20       | 0.56              | 1.31                | 7.30         | 0.40                         | 7.32           | 6.92                     | 3.82                | 5.22  |
| 1.10                  | 1.16       | 7.04              | 0.00                | 9.30         | 0.00                         | 1.47           | 1.47                     |                     | 2.72  |
| 0.35                  | 2.92       | 0.56              | 1.55                | 5.38         | 0.58                         | 11.42          | 10.84                    | 9.15                | 9.50  |
| 0.58                  | 3.20       | 2.72              | 1.50                | 8.00         | 0.95                         | 11.52          | 10.57                    | 6.00                | 6.42  |
|                       |            |                   |                     | <u>19.92</u> |                              |                |                          |                     |       |
| 0.22                  | 6.72       | 0.88              | 1.48                | 9.30         | 0.33                         | 7.85           | 7.52                     | 3.86                | 4.97  |
| 0.46                  | 2.12       | 0.52              | 0.22                | 3.32         | 0.50                         | 20.50          | 20.00                    | 1.87                | 3.83  |

<sup>4</sup> Mechanical analysis: Fine, 60.0%; coarse, 40.0%.

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Station No.       | Manufacturer and brand                                         | Place of sampling |
|-------------------|----------------------------------------------------------------|-------------------|
| 697               | G & O Rose Food 7-8-5                                          | Hartford          |
| 965               | G & O Special Food for Bulbs 5-6-15                            | New Canaan        |
|                   | <u>HELLER GREENHOUSE LABORATORIES, Colorado Springs, Colo.</u> |                   |
| 452               | Heller-Gro Complete Plant Food<br>15-15-15                     | Greenwich         |
|                   | <u>A. H. HOFFMAN, INC.</u><br>Landisville, Pa.                 |                   |
| 663               | Hoffman Azalea & Evergreen Food<br>4-6-10                      | Danbury           |
| 664 <sup>5</sup>  | Hoffman Cow Manure 2-1-1                                       | Danbury           |
| 887               | Hoffman Rose Food 5-10-5                                       | Granby            |
| 786 <sup>6</sup>  | Hoffman Sheep Manure 1-1-2                                     | Thompsonville     |
| 1104 <sup>7</sup> | Hoffman Sterilized Bone Meal 2-17-0                            | New London        |
|                   | <u>THE HUBBARD-HALL CHEMICAL CO.</u><br>Waterbury, Conn.       |                   |
| 592               | Gro-Fast Rose Food 7-10-5                                      | Hamden            |
| 548 <sup>8</sup>  | HH Bone Meal 2-23-0                                            | Bridgeport        |
| 1108              | HH Cottonseed Meal 6-0-0                                       | West Hartford     |
| 387               | HH Evergreen Food 4-10-4                                       | New Haven         |
| 549               | HH Evergreen Food 4-10-4                                       | Bridgeport        |
| 751               | HH Muriate of Potash 0-0-60                                    | Darien            |
| 661               | HH Plant Food 5-10-5                                           | Danbury           |
| 662               | HH Rose Food 7-10-5                                            | Danbury           |
| 865 <sup>9</sup>  | HH Sheep Manure & Inert Matter<br>1.25-1-1                     | Bristol           |
|                   | <u>HYDROPONIC CHEMICAL CO. INC.</u><br>Copley, Ohio            |                   |
| 450               | Hyponex African Violet Food 7-6-19                             | Greenwich         |
| 352               | Hyponex All Purpose Plant Food<br>7-6-19                       | New Haven         |
|                   | <u>THE HY-TROUS CORP.</u><br>Boston, Mass.                     |                   |
| 388               | Hy-Trous Liquid Fertilizer 4-8-4                               | New Haven         |

~~~~ indicates deficiencies.

<sup>5</sup> Sand, 1.69%.

<sup>6</sup> Sand, 58.69%.



TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Nitrogen,<br>per cent |            |                   |                     |             | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |              |
|-----------------------|------------|-------------------|---------------------|-------------|------------------------------|-------|--------------------------|---------------------|--------------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total       | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total        |
| 0.39                  | 4.64       | 1.24              | 0.93                | 7.20        | 0.48                         | 8.97  | 8.49                     | 5.01                | 5.87         |
| 0.25                  | 2.52       | 1.68              | 0.71                | 5.16        | 0.53                         | 7.00  | 6.47                     | 12.10               | <u>14.71</u> |
| 4.50                  | 3.40       | 7.80              | 0.00                | 15.70       | 0.00                         | 16.00 | 16.00                    |                     | 16.08        |
| 0.68                  | 3.48       | 0.04              | 0.96                | 5.16        | 0.72                         | 11.15 | 10.43                    | 8.74                | 10.74        |
|                       |            |                   |                     | 1.92        | 0.18                         | 1.30  | 1.12                     |                     | 2.88         |
| 0.00                  | 4.08       | 0.09              | 0.93                | 5.10        | 0.10                         | 10.35 | 10.25                    | 4.37                | 5.66         |
|                       |            |                   |                     | <u>0.80</u> | 0.25                         | 1.15  | 0.90                     |                     | 2.88         |
|                       |            |                   |                     | <u>2.60</u> | 7.97                         | 29.40 | 21.43                    |                     |              |
| 0.16                  | 2.40       | 4.28              | 1.18                | 8.02        | 0.30                         | 9.95  | <u>9.65</u>              | 0.27                | <u>4.68</u>  |
|                       |            |                   |                     | 1.72        |                              | 31.20 |                          |                     |              |
|                       |            |                   |                     | <u>6.50</u> |                              |       |                          |                     |              |
| 0.00                  | 2.04       | 1.49              | 1.17                | 4.70        | 0.45                         | 10.87 | 10.42                    | 3.85                | 4.24         |
| 0.29                  | 1.80       | 1.04              | 1.33                | 4.46        | 0.65                         | 11.37 | 10.72                    | 3.65                | 4.52         |
|                       |            |                   |                     |             |                              |       |                          |                     | 61.76        |
| 0.15                  | 1.88       | 2.00              | 1.01                | 5.04        | 0.73                         | 10.80 | 10.07                    | 4.85                | 5.41         |
| 0.41                  | 4.16       | 1.64              | 1.55                | 7.76        | 1.23                         | 12.15 | 10.92                    | 0.92                | 6.52         |
|                       |            |                   |                     | 1.32        |                              | 1.60  |                          |                     | 1.99         |
| 5.63                  | 1.16       | 0.32              | 0.11                | 7.22        | 0.20                         | 7.70  | 7.50                     |                     | 21.10        |
| 6.03                  | 1.24       | 0.00              | 0.05                | 7.32        | 0.15                         | 7.20  | 7.05                     |                     | 20.77        |
| 1.28                  | 1.80       | 1.08              | 0.00                | 4.16        | 0.00                         | 8.05  | 8.05                     |                     | 4.84         |

<sup>7</sup> Mechanical analysis: Fine, 57.0%; coarse, 43.0%.

<sup>8</sup> Mechanical analysis: Fine, 49.0%; coarse, 51.0%.

<sup>9</sup> Sand, 36.84%.

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Station No. | Manufacturer and brand   | Place of sampling |
|-------------|--|-------------------|
|             | <u>LEBANON CHEMICAL CORP.</u><br>Lebanon, Pa.                  |                   |
| 698         | Lebanon Plant Food 5-10-5                                      | Hartford          |
|             | <u>MILLER CHEMICAL &amp; FERTILIZER CORP.</u> , Baltimore, Md. |                   |
| 929         | VHPF 6-25-15   | Wethersfield      |
|             | <u>PARKS-BARNES, INC.</u><br>Hermosa Beach, Calif.             |                   |
| 356         | Black Magic Plant Food 2-3-2                                   | Cheshire          |
| 363         | Blossom Booster for African Violets<br>4-10-10                 | Cheshire          |
|             | <u>PLANTABBS CORP.</u><br>Baltimore, Md.                       |                   |
| 475         | Plantabbs Liquid Plant Food 10-10-10                           | Old Greenwich     |
| 473         | Plantabbs Soluble Plant Food Powder<br>11-15-20                | Old Greenwich     |
|             | <u>PLANT SHINE CO.</u><br>St. Louis, Mo.                       |                   |
| 889         | Schultz Instant Liquid Plant Food<br>10-15-10                  | West Hartford     |
| 481         | Schultz Instant Plant Food 20-30-20                            | Hamden            |
|             | <u>RA-PID-GRO CORP.</u><br>Dansville, N. Y.                    |                   |
| 453         | Ra-Pid-Gro 23-21-17  | Greenwich         |
|             | <u>THE RENARD CO.</u><br>Yonkers, N. Y.                        |                   |
| 648         | Plant Pen 5-0-0  | New Milford       |
|             | <u>SEARS, ROEBUCK &amp; CO.</u><br>Chicago, Ill.               |                   |
| 758         | Cross Country Bulb Food 4-12-8                                 | Norwalk           |
| 594         | Cross Country Evergreen Food 10-6-4                            | Hamden            |
| 595         | Cross Country Instant Rose Food<br>20-20-20                    | Hamden            |
| 1050        | Cross Country Instant Tomato Food<br>15-30-15                  | New London        |

~~~~~ indicates deficiencies.

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Nitrogen,<br>per cent |            |                   |                     |              | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |              |
|-----------------------|------------|-------------------|---------------------|--------------|------------------------------|-------|--------------------------|---------------------|--------------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total        | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total        |
| 1.14                  | 3.32       | 0.44              | 0.00                | 4.90         | 0.33                         | 10.60 | 10.27                    | 3.89                | 5.57         |
| 3.62                  | 1.76       | 0.90              | 0.00                | 6.28         | 0.20                         | 27.45 | 27.25                    |                     | 16.62        |
| 0.00                  | 0.00       | 0.00              | 2.46                | 2.46         | 0.38                         | 3.92  | 3.54                     |                     | 4.98         |
| 0.00                  | 0.36       | 4.18              | 0.00                | 4.54         | 0.00                         | 10.07 | 10.07                    |                     | 10.33        |
| 0.00                  | 0.24       | 10.56             | 0.00                | 10.80        | 0.00                         | 10.00 | 10.00                    |                     | 10.12        |
| 8.28                  | 3.64       | 0.00              | 0.00                | 11.92        | 0.08                         | 16.20 | 16.12                    |                     | 21.67        |
| 0.00                  | 1.52       | 8.52              | 0.00                | 10.04        | 0.00                         | 14.70 | 14.70                    |                     | 9.58         |
| 2.30                  | 2.68       | 15.68             | 0.00                | 20.66        | 0.03                         | 28.85 | <u>28.82</u>             |                     | <u>18.98</u> |
| 3.52                  | 4.12       | 15.12             | 0.00                | <u>22.76</u> | 0.00                         | 20.00 | <u>20.00</u>             |                     | 16.80        |
|                       |            |                   |                     | 8.20         |                              |       |                          |                     |              |
| 0.39                  | 3.12       | 0.36              | 0.19                | 4.06         | 0.40                         | 13.40 | 13.00                    | 8.21                | 8.69         |
| 0.55                  | 8.76       | 0.80              | 0.13                | 10.24        | 0.27                         | 6.37  | 6.10                     | 2.58                | 4.78         |
| 6.00                  | 5.80       | 8.36              | 0.00                | 20.16        | 0.13                         | 20.80 | 20.67                    |                     | 21.16        |
| 0.10                  | 6.32       | 10.00             | 0.00                | 16.42        | 0.03                         | 30.55 | 30.52                    | 10.86               | 15.93        |

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Station No.        | Manufacturer and brand                                                  | Place of sampling |
|--------------------|-------------------------------------------------------------------------|-------------------|
| 1049               | Cross Country Liquid Plant Food<br>15-10-5                              | New London        |
| 630                | Cross Country Rose Food 5-10-5                                          | Manchester        |
|                    | <u>ST. LOUIS NATIONAL STOCKYARDS</u><br>CO., National Stock Yards, Ill. |                   |
| 1057 <sup>10</sup> | Wizard Brand Cow Manure 2-1-2                                           | Ledyard           |
|                    | <u>STERN'S NURSERIES, INC.</u><br>Geneva, N. Y.                         |                   |
| 545                | Stern's Miracid 30-10-10                                                | Bridgeport        |
|                    | <u>STIM-U-PLANT LABORATORIES</u><br>Columbus, Ohio                      |                   |
| 474                | Stim-U-Plant African Violet Food<br>5-8-7                               | Old Greenwich     |
|                    | <u>STOCKDALE FERTILIZER CO.</u><br>Morris, Ill.                         |                   |
| 785 <sup>11</sup>  | Ovene Sheep Sticks 2-1-2                                                | Thompsonville     |
|                    | <u>SWIFT &amp; CO.</u><br>Chicago, Ill.                                 |                   |
| 610                | Instant Vigoro 20-10-15                                                 | Milford           |
| 406                | Pink Vigoro 8-12-6                                                      | Wallingford       |
| 649                | Vigoro Evergreen Food 6-7-8                                             | New Milford       |
| 600                | Vigoro Rose Food 6-10-4                                                 | Bridgeport        |
|                    | <u>SWISS FARMS</u><br>Philmont, N. Y.                                   |                   |
| 480                | Plantdrops Instant Liquid African<br>Violet Food 5-18-6                 | Hamden            |
| 490                | Plantdrops Instant Liquid Plant Food<br>6-18-6                          | Hamden            |
|                    | <u>UNIVERSAL CHEMICAL CO.</u><br>West Lynn, Mass.                       |                   |
| 451                | Electra Plant Food 5-10-3                                               | Greenwich         |

~~~~ indicates deficiencies.

<sup>10</sup> Sand, 35.18%.



TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Nitrogen,<br>per cent |            |                   |                     |             | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |              |
|-----------------------|------------|-------------------|---------------------|-------------|------------------------------|-------|--------------------------|---------------------|--------------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total       | Citrate-<br>insoluble        | Total | So-called<br>"available" | As<br>muriate       | Total        |
| 0.00                  | 3.76       | 11.38             | 0.00                | 15.14       | 0.00                         | 10.27 | 10.27                    | 1.39                | 5.10         |
| 0.40                  | 3.88       | 0.64              | 0.20                | 5.12        | 0.45                         | 10.50 | 10.05                    | 4.29                | 5.44         |
|                       |            |                   |                     | <u>1.64</u> | 0.40                         | 2.17  | 1.77                     |                     | 2.06         |
| 1.60                  | 3.76       | 24.96             | 0.00                | 30.32       | 0.15                         | 11.10 | 10.95                    | 7.46                | 10.51        |
| 2.72                  | 4.16       | 0.00              | 0.18                | 7.06        | 0.00                         | 12.05 | 12.05                    |                     | 9.83         |
|                       |            |                   |                     | <u>1.50</u> | 0.50                         | 1.70  | 1.20                     |                     | 4.65         |
| 1.30                  | 10.04      | 9.20              | 0.00                | 20.54       | 0.08                         | 12.32 | 12.24                    | 6.53                | <u>12.45</u> |
| 0.18                  | 6.80       | 2.60              | 0.14                | 9.72        | 0.48                         | 14.70 | 14.22                    | 5.39                | <u>6.48</u>  |
| 1.15                  | 5.48       | 0.32              | 0.35                | 7.30        | 0.35                         | 7.50  | 7.15                     | 5.84                | 8.42         |
| 0.96                  | 2.84       | 0.60              | 2.10                | 6.50        | 2.28                         | 12.30 | 10.02                    | 3.39                | 5.07         |
| 0.00                  | 6.12       | 0.24              | 0.00                | 6.36        | 0.00                         | 18.50 | 18.50                    | 4.53                | 7.27         |
| 0.10                  | 5.96       | 0.08              | 0.00                | 6.14        | 0.00                         | 18.60 | 18.60                    | 4.41                | 6.55         |
| 0.48                  | 2.28       | 0.16              | 1.78                | <u>4.70</u> | 0.33                         | 11.80 | 11.47                    | 2.90                | 3.29         |

<sup>11</sup> Sand, 32.45%.

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Station No.       | Manufacturer and brand   | Place of sampling |
|-------------------|--|-------------------|
| 996 <sup>12</sup> | <u>WALKER-GORDON LABORATORY CO.</u><br>Plainsboro, N. J.<br>Bovung 2-1-2     | New Canaan        |
| 493               | <u>THE WILBUR-ELLIS CO.</u><br>New York, N. Y.<br>Wil-Gro 10-5-5             | Manchester        |
| 454               | <u>ANDREW WILSON, INC.</u><br>Springfield, N. J.<br>Wilson's Rose Food 4-8-5 | Greenwich         |

~~~~ indicates deficiencies.

<sup>12</sup> Sand, 1.54%.

TABLE 7. ANALYSES OF SMALL PACKAGE FERTILIZERS

| Nitrogen,<br>per cent |            |                   |                     |       | Phosphoric acid,<br>per cent |       |                          | Potash,<br>per cent |       |
|-----------------------|------------|-------------------|---------------------|-------|------------------------------|-------|--------------------------|---------------------|-------|
| Nitrate               | Ammoniacal | Water-<br>soluble | Water-<br>insoluble | Total | Citrate-<br>insoluble        | Total | So-called<br>"available" | As muriate          | Total |
|                       |            |                   |                     | 1.90  | 0.28                         | 1.32  | 1.04                     |                     | 2.59  |
| 0.00                  | 0.64       | 9.54              | 0.00                | 10.18 | 0.00                         | 5.40  | 5.40                     | 0.12                | 6.31  |
| 0.40                  | 2.44       | 0.40              | 1.58                | 4.82  | 0.45                         | 7.20  | <u>6.75</u>              | 5.68                | 6.59  |

TABLE 8. ANALYSES OF OTHER MISCELLANEOUS MATERIALS  
(Figures are in per cent)

| Station No. | Material                                         | Total nitrogen     | Total phosphoric acid | Citrate-insoluble phosphoric acid | "Available" phosphoric acid | Water-soluble potash | Chlorine | Water | Calcium oxide | Magnesium oxide |
|-------------|--------------------------------------------------|--------------------|-----------------------|-----------------------------------|-----------------------------|----------------------|----------|-------|---------------|-----------------|
| 350         | "African Violet Food Liquid 6-18-6" <sup>2</sup> | 5.80 <sup>1</sup>  | 19.35                 | 0.00                              | 19.35                       | 6.01                 | 2.74     |       |               |                 |
| 947         | Amino pyrolysis wood product                     | 10.00 <sup>3</sup> | 12.00                 | 0.05                              | 11.95                       | 0.36                 |          |       |               |                 |
| 293         | Blue spruce needles                              | 1.28               | 2.85                  |                                   |                             | 2.56                 |          |       |               |                 |
| 1398        | Chicken manure                                   | 4.22               | 1.82                  |                                   |                             | 1.51                 | 0.72     |       |               |                 |
| 564         | Compost                                          | 2.12               | 8.60                  | 0.15                              | 8.45                        | 11.81                | trace    |       |               |                 |
| 442         | "Fenorco Plant Food 4-7-11"                      | 4.38 <sup>4</sup>  | 1.00                  | 0.03                              | 0.97                        | 0.32                 |          |       |               |                 |
| 1301        | "Gardenia Plant Food"                            | 0.28               | 6.95                  | 0.69                              | 6.26                        | 6.48                 | 4.35     |       |               |                 |
| 566         | "Gard N Stik 5-4-4"                              | 5.00               | 3.20                  |                                   |                             | 1.80                 |          |       |               |                 |
| 7855        | Hen manure <sup>5</sup>                          | 1.90               |                       |                                   |                             |                      |          |       |               |                 |
| 750         | H-H Aluminum Sulphate <sup>6</sup>               |                    |                       |                                   |                             |                      |          |       | 51.80         | 30.74           |
| 9459        | Hydrated lime                                    |                    |                       |                                   |                             |                      |          |       | present       | present         |
| 638         | "Hydrojet Chlordane Liquid Life 24-12-12"        | 0.28               | 0.25                  | 0.01                              | 0.24                        | 0.41                 | 0.00     |       |               |                 |
| 9278        | Limestone                                        |                    |                       |                                   |                             |                      |          |       |               |                 |
| 759         | Liquid fertilizer for spraying lawns             | 9.46               | 9.00                  |                                   |                             | 4.08                 |          |       |               |                 |
| 486         | Mixture of manure and tobacco stems dehydrated   | 1.50               | 0.20                  | 0.03                              | 0.17                        | 8.59                 | 1.51     | 48.58 | 2.84          | 0.75            |
| 949         | Mussels                                          | 0.63 <sup>7</sup>  | 6.80                  |                                   |                             | 1.25                 | 0.16     |       |               |                 |
| 565         | "Organo"                                         | 2.40               | 12.37                 | 0.00                              | 12.37                       | 8.08                 | trace    |       |               |                 |
| 351         | "Plant Food Liquid 8-12-8" <sup>9</sup>          | 8.12 <sup>8</sup>  | 2.25                  |                                   |                             | 0.59                 |          |       |               |                 |
| 485         | Potting soil                                     | 0.86               |                       |                                   |                             |                      |          |       |               |                 |



|      |                                                                                  |                    |      |  |  |                    |      |      |       |
|------|----------------------------------------------------------------------------------|--------------------|------|--|--|--------------------|------|------|-------|
| 484  | Potting soil, plain                                                              | 1.04               | 0.90 |  |  |                    |      |      |       |
| 288  | Poultry manure                                                                   | 3.28               | 5.97 |  |  | 0.00               |      |      |       |
| 289  | Poultry manure                                                                   | 3.02               | 6.17 |  |  | 5.97               |      | 0.00 |       |
| 604  | Pulverized chicken manure                                                        | 2.96               | 4.80 |  |  | 5.72               |      | 0.45 |       |
| 746A | "Sea-Born"                                                                       | 0.74 <sup>10</sup> | 0.32 |  |  | 2.40               |      |      |       |
| 9383 | Sewage sludge                                                                    | 0.47               | 0.21 |  |  | 2.26 <sup>12</sup> | 1.46 |      | 87.04 |
| 945  | Tobacco dust residue                                                             | 3.10 <sup>13</sup> | 0.05 |  |  | 0.01               |      |      |       |
| 946  | Tobacco dust residue                                                             | 3.02 <sup>14</sup> | 0.45 |  |  | 5.82               |      | 0.44 |       |
| 1399 | Turkey manure                                                                    | 1.08               | 2.10 |  |  | 0.35               |      | 5.62 |       |
| 570  | "20 Mule Team Fertilizer<br>Borate 46, High Grade,<br>Coarse Mesh" <sup>15</sup> |                    |      |  |  | 1.07               |      |      |       |
| 206  | Wheat dust from elevator                                                         | 1.52               | 0.67 |  |  |                    |      |      | 1.42  |

<sup>1</sup> Nitrate nitrogen, 0.00; ammonia nitrogen, 5.68, and soluble organic nitrogen, 0.12, per cent.

<sup>2</sup> Acid-forming quality, 482 lb. calcium carbonate per ton.

<sup>3</sup> Nitrogen nitrogen, 0.00; ammonia nitrogen, 4.88; soluble organic nitrogen, 1.22; active insoluble nitrogen, 1.35, and inactive insoluble nitrogen, 1.65, per cent.

<sup>4</sup> Nitrate nitrogen, 1.00, and ammonia nitrogen, 3.38, per cent.

<sup>5</sup> Sand, 34.09 per cent.

<sup>6</sup> Aluminum: Guaranteed, 9.00 per cent; found, 9.58 per cent.

<sup>7</sup> Nitrate nitrogen, 0.00; ammonia nitrogen, 0.02; soluble organic nitrogen, 0.22; active insoluble nitrogen, 0.26, and inactive insoluble nitrogen, 0.13, per cent.

<sup>8</sup> Nitrate nitrogen, 0.00; ammonia nitrogen, 2.64, and water-soluble organic nitrogen, 5.48, per cent.

<sup>9</sup> Acid-forming quality, 295 lb. calcium carbonate per ton.

<sup>10</sup> Guaranteed 1.00.

<sup>11</sup> Guaranteed 0.34.

<sup>12</sup> Guaranteed 1.00.

<sup>13</sup> Nitrate nitrogen, 0.76; ammonia nitrogen, 0.16; soluble organic nitrogen, 0.68; active insoluble nitrogen, 0.62, and inactive insoluble nitrogen, 0.88, per cent. Nicotine, 0.83 per cent.

<sup>14</sup> Nitrate nitrogen, 0.70; ammonia nitrogen, 0.08; soluble organic nitrogen, 0.72; active insoluble nitrogen, 0.66, and inactive insoluble nitrogen, 0.86, per cent. Nicotine, 0.82 per cent.

<sup>15</sup> Boron: Guaranteed, 14.3 per cent; found, 14.4 per cent.

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